Users Guide

HITACHI

WIDE SCREEN

TruBass by SRS

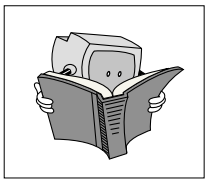
CL32PD2100
CL37PD2100
CL42PD2100

HITACHI

Dear HITACHI customer

Congratulations on your purchase of the very latest state of the art television from HITACHI. At Hitachi we pride ourselves on producing high quality televisions with outstanding picture and audio capabilities. Together with our reputation for superior reliability, you should enjoy many years of trouble free operation from your TV.

Important



Please read this Users Guide thoroughly, especially the Safety Notes on Pages 4 & 5. Mis-use may cause damage to your plasma television, which could shorten its lifespan, or cause injury to yourself. Should you encounter any difficulty in the set-up or operation of your television, firstly refer to the Trouble Shooting Guide at the rear of this manual.

In the unlikely event of a problem occurring with your plasma TV, switch off at the mains sockets, pull out the plugs, and contact your dealer immediately.

Under no circumstances remove the rear cover of your plasma screen or the casing of your Audio VIsual Control (AVC) unit. Never guess or take any chances with electrical equipment of any kind - it is better to be safe than sorry!

TruBass

TruBass and the ((●))® symbol are trademarks of SRS Labs, Inc.
TruBass technology is incorporated under license from SRS Labs, Inc.

Software Notice

It is prohibited for the end user of this product to copy, reverse engineer or reverse compile the software included therein, save to the extent permitted by law.

Plasma Screen

After the plasma screen has been on for any length of time, you will notice that the screen becomes warm. Please note that this is normal.

Caution

To prevent scratching or damaging the plasma screen face, do not knock or rub the surface with sharp or hard objects. Clean the screen with a soft cloth moistened with warm water and dry with a soft cloth. A mild soap may be used if the screen is extremely dirty. Do not use harsh or abrasive cleaners!

contents

safety aspects
- television safety 4
- battery safety and installation....6

rear socket and scart details. 7

set-up
- plasma screen, AVC unit and equipment connection 8

front control panel details....10

handset controls
- programme tuning 11
- television/VCR operation....12
- Teletext functions 13

tuning in
- TV set up and automatic tuning procedure 14
- manual tuning procedure 16
- programme sort 18
- programme name change and download 19
- viewlink 20
- customer I.D. 22
- password change 23

programme, sound and vision adjustment
- picture controls....24
- NICAM and stereo sound controls 25
- audio and TruBass controls 26

television features
- sleep timer and on screen display 28
- wide screen viewing 29
- Teletext operation 31

other equipment
- other equipment connection 32
- signal source entry 33

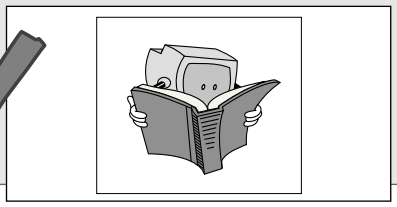
other features
- language and installation 35
- programme download and demo mode 36
- screen saver, screen wipe & no signal shutdown 37
- PC mode....38

information
- trouble shooting guide 41
- guarantee 42
- HITACHI environmental notice 43
- technical data 44

Please Note

The television illustrated throughout this manual is the CL32PD2100. Other models differ in appearance, but controls and functions remain the same.

This plasma television has been designed and manufactured to meet international safety standards, but like any electrical equipment, care must be taken if you are to obtain the best results and safety is to be assured.



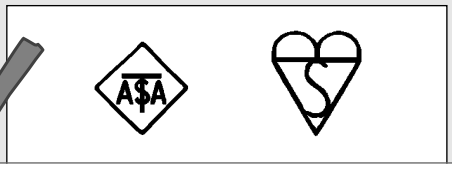
DO read the operating instructions before you attempt to use the equipment.

DO consult your dealer if you are in any doubt about installation, operation or safety of your equipment.

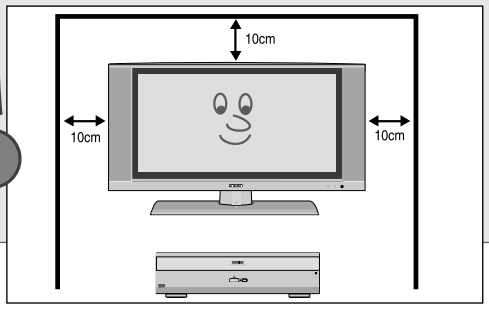
DO be careful with any glass panels or doors on equipment.

DO place your TV on a flat surface, or if supplied, the stand accessory.

DO ensure that all connections, (including the mains plug, extension leads and inter-connections between the pieces of equipment), are properly made and in accordance with the manufacturers instructions. Switch off and withdraw the mains plug before making or changing connections.



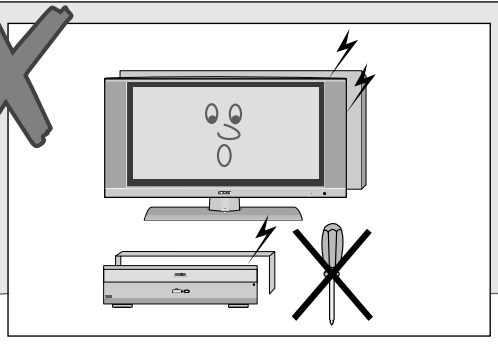
DO observe the manufacturers instructions when connecting extension leads to your TV. The fuse should be a 5 Amp fuse with the safety symbols and displayed. If you are in any doubt about the extension installation, please consult a competent electrician.



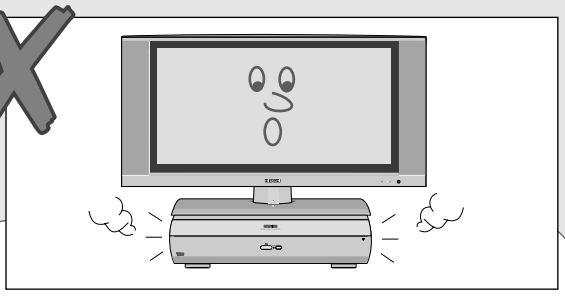
IF you intend placing this TV into a cabinet or a wall alcove, please ensure there is at least a 100mm (10cm) gap to the sides, rear and top of the TV. This is to allow for adequate ventilation during your TV's operation.

SHOULD you require to replace the fuse in the moulded plug with a new fuse, then please replace with one of the same value, type and approval as the original. Ensure the fuse cover is returned to its original position.

TO prevent scratching or damaging the plasma screen face, do not knock or rub the surface with sharp or hard objects. Clean the screen with a soft cloth moistened with warm water and dry with a soft cloth. A mild soap may be used if the screen is extremely dirty. Do not use harsh or abrasive cleaners!



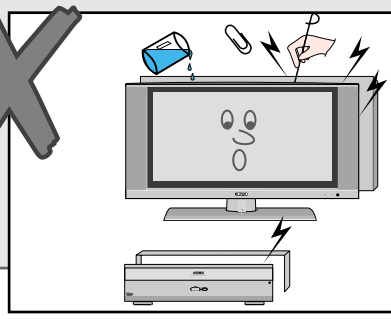
DO NOT remove any fixed cover as this may expose dangerous voltages.



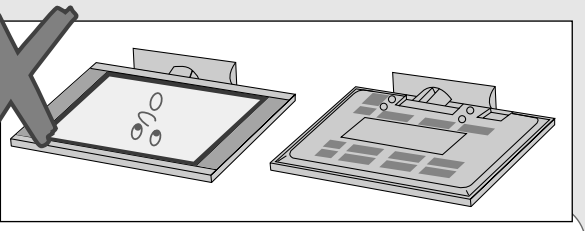
DO NOT position the plasma screen on top of the AVC unit as it could cause damage to the unit.

DO NOT continue to operate the equipment if you are in any doubt about it working normally or if it is damaged in any way - switch off, withdraw the mains plug and consult your dealer.

DO NOT listen to headphones at high volume, as such use can permanently damage your hearing.

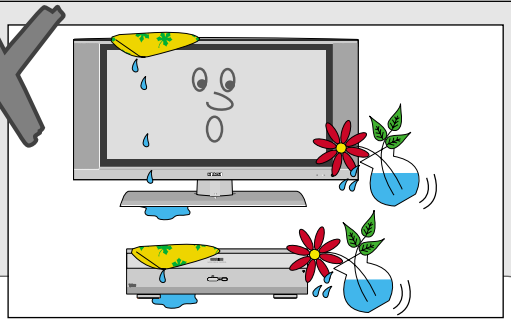


NEVER let anyone, especially children, push anything into holes, slots, or any other opening in the case - this could result in a fatal electrical shock. Under **NO** circumstances remove the rear cover of your plasma screen or the casing of your Audio Visual Control (AVC) unit!

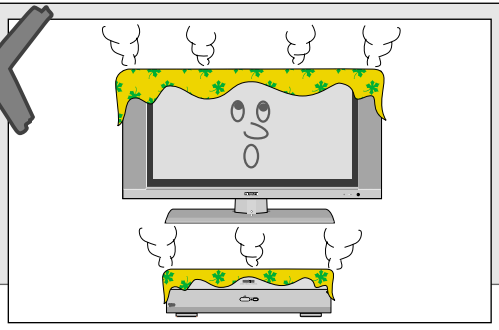


DO NOT lie the plasma screen flat.

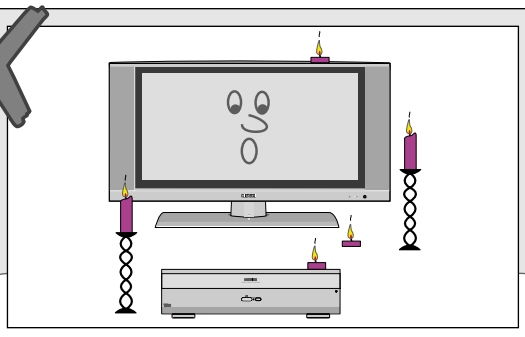
DO NOT cut off the fitted mains plug as it may contain a special radio interference filter, the removal of which could lead to impaired performance. If you wish to extend the lead, obtain an appropriate extension lead or consult your dealer.



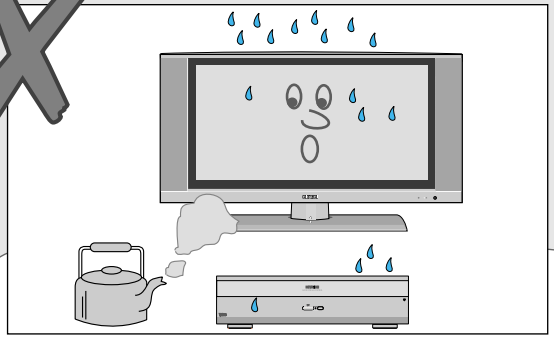
DO NOT place objects filled with liquids, e.g. a vase, on, or close to the equipment, to avoid spillages into the inside of the apparatus.



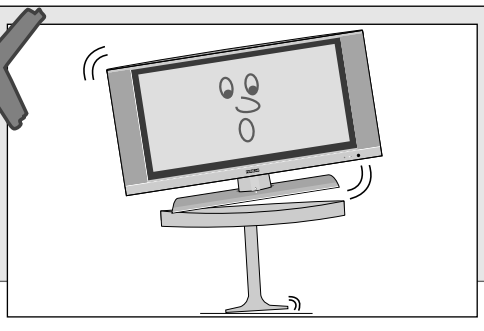
DO NOT obstruct the ventilation of the equipment, for example with curtains or soft furnishings. Overheating will cause damage and shorten the lifespan of your equipment.



DO NOT place hot objects such as candles or nightlights on, or close to equipment. High temperatures can melt plastic and lead to fires.



DO NOT allow electrical equipment to be exposed to rain or moisture.

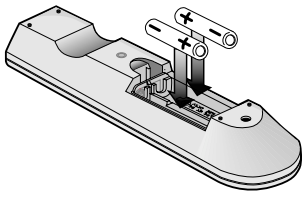


DO NOT use makeshift stands and NEVER fix legs with wood screws - to ensure complete safety, always fit the manufacturers approved stand or legs with the fixings provided according to the instructions.

DO NOT leave equipment switched on when it is unattended unless it is specifically stated that it is designed for unattended operation or has a stand-by mode. Switch off using the switch on the equipment and show your family how to do this. Make special arrangements for infirm or handicapped people.

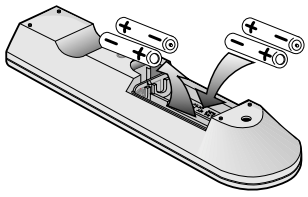
NEVER guess or take chances with electrical equipment of any kind - it is better to be safe than sorry!

always



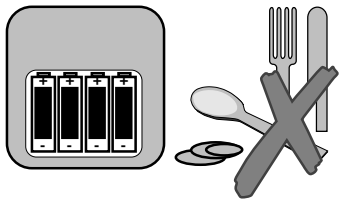
Take care to fit your batteries correctly, observing the plus '+' and minus '-' marks on the battery and appliance. Incorrect fitting can cause leakage, or in extreme cases, fire or explosion.

always



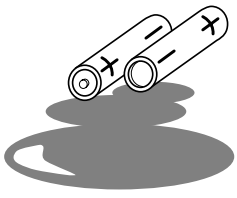
Replace the whole set of batteries at one time, taking care not to mix old and new batteries of different types, since this can result in leakage, or in extreme cases, fire or explosion.

always



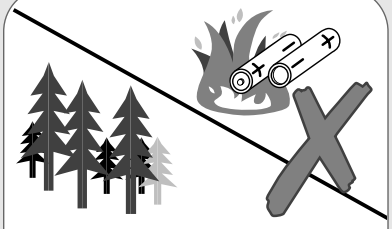
Store unused batteries in their packaging and away from metal objects which may cause a short circuit resulting in leakage, or in extreme cases, fire or explosion.

always



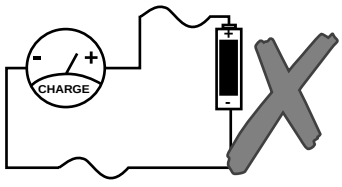
Remove dead batteries from equipment, and all batteries from equipment that is to be left for long periods of time without any use. Otherwise the batteries may leak and cause damage.

never!



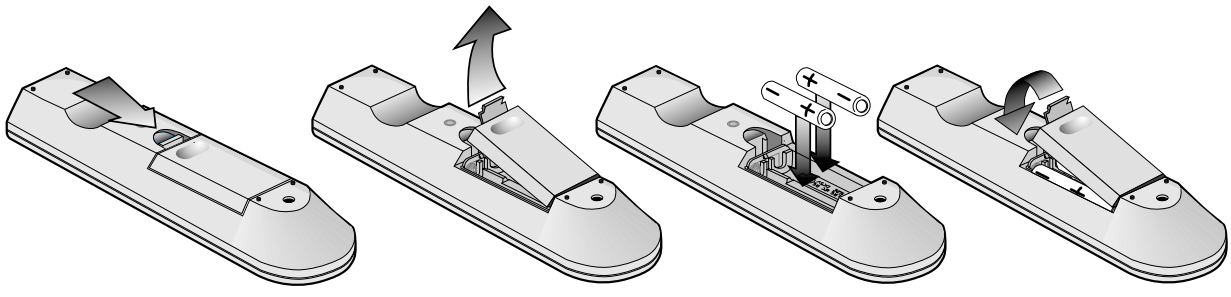
Never dispose of batteries in fire as this can cause an explosion.
Respect the environment - always dispose of batteries in an environmentally friendly manner.

never!



Never attempt to recharge ordinary batteries, either in a charger or by applying heat to them. They may leak, cause fire or even explode.
Rechargeable NiCAD batteries and chargers can be purchased from any good High Street electrical retailer.

battery installation



1. Remove cover of handset by lifting up the cover at the recess.
2. Insert batteries into handset as shown and replace cover.

1. When inserting the batteries make sure the polarities are correct, that is, '+' to '+', '-' to '-'.
2. Replace the batteries with the equivalent 'AA' type.
3. Discard old batteries safely, following the battery safety guidelines.

audio output (RCA)

These sockets can be used to connect to external amplifier or Hi-Fi system.

VGA input

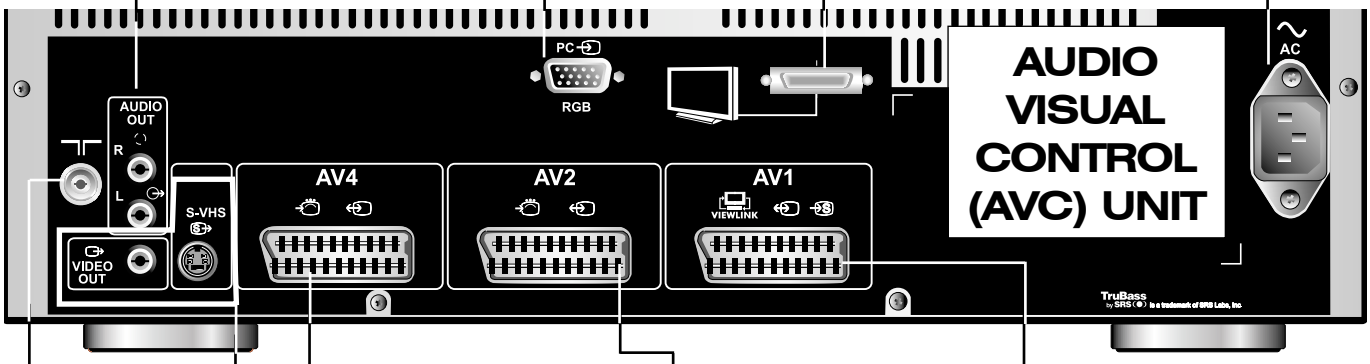
Use this to connect to your computer if desired.

Link Socket

This should be connected to your plasma screen via the link lead.

Mains Socket

This should be connected to the Mains Supply via the supplied Mains Lead.



AV4 scart input

Use this to connect digital video broadcasting equipment, home entertainment systems and DVD players etc. to your TV.

AV2 scart input

Use this to connect digital video broadcasting equipment and home entertainment systems to your TV.

AV1 scart input

Use this socket to connect ordinary VHS, S-VHS or Hi8 equipment to your TV. (Connect VCR to AV1 for Viewlink).

RF aerial socket

This should be permanently connected to an RF source - i.e your aerial antenna.

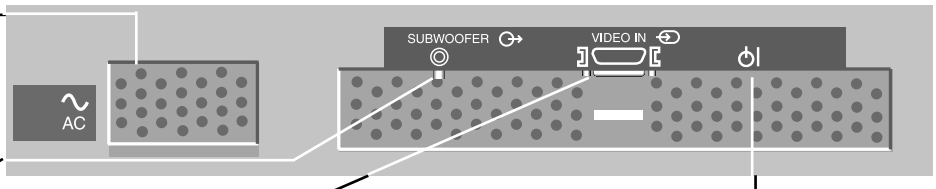
Output sockets (SVHS monitor out & video out)

These sockets can be used to connect to external equipment to supply a picture only, (no menus or Text), e.g. to a video projector.

PLASMA SCREEN

Mains Socket

This should be connected to the Mains Supply via the supplied Mains Lead.



SubWoofer

This socket can be used to connect a SubWoofer speaker.*

Link Socket

This should be connected to your AVC Unit via the link lead.

test button

Use this button if you wish to test the functionality of the plasma screen without the AVC unit being attached. Press and hold this button for more than 5 seconds and a test picture will be displayed on the screen.

*If this product is used with an active SubWoofer, it is possible to change its frequency by adjusting the LPF (Low Pass Filter) control on the Subwoofer speaker. This will enable you to select the most suitable sound performance.

important note on installation

If you intend placing this TV into a cabinet or wall alcove, please ensure there is at least a 100mm (10cm) gap to the sides, rear and top of the television. This is to allow for adequate ventilation.

Do not allow soft furnishings, such as curtains to be draped over the TV whilst in operation.

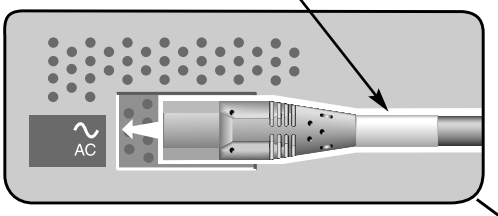
Never place the TV onto a carpet during normal operation - this could obstruct ventilation slots on the base of the TV.

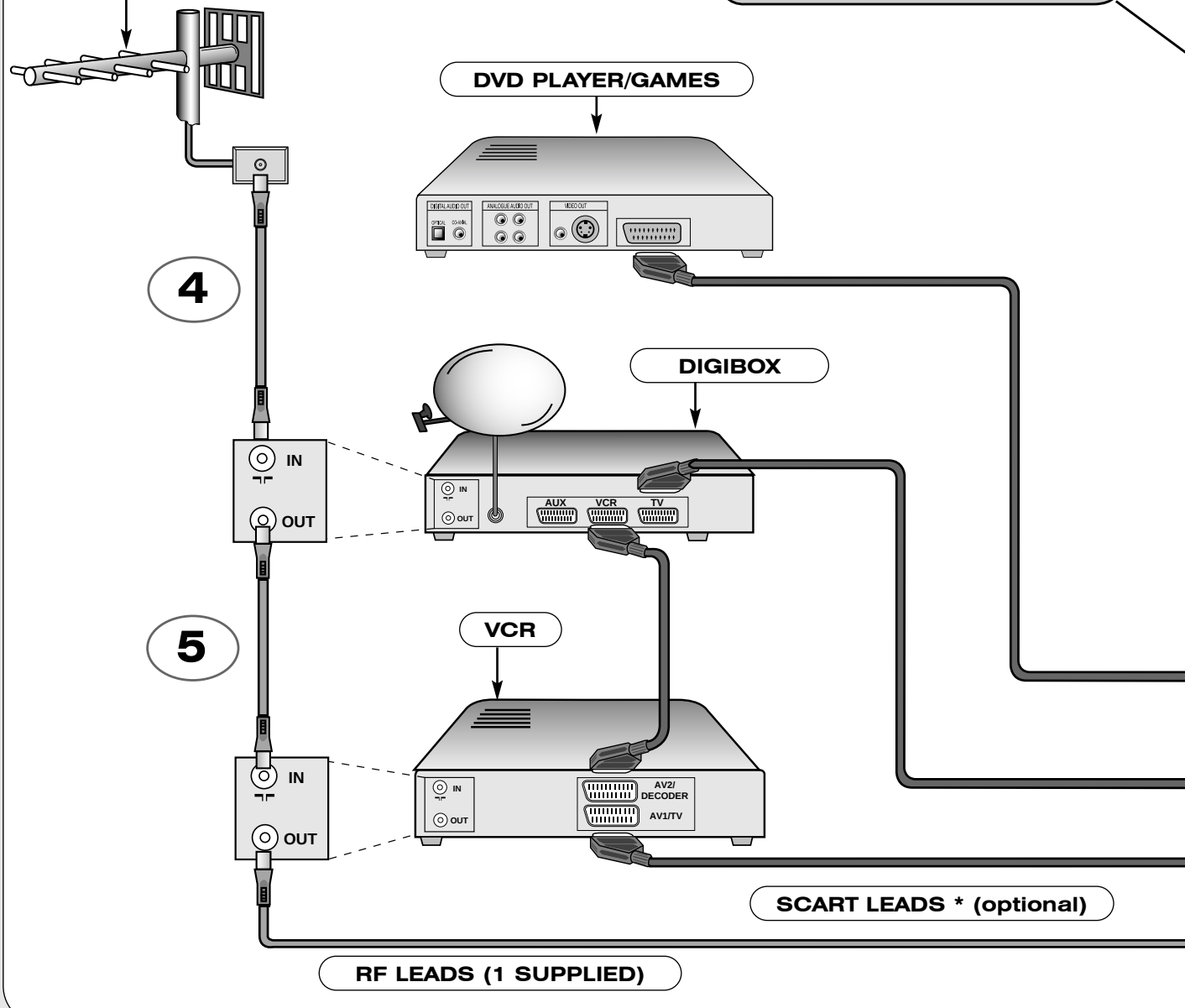
Always place the TV on a flat surface, or if supplied, the stand accessory.

Failure to observe the above guidelines could result in serious overheating of your TV, or even, in extreme cases, fire.

TV Setup

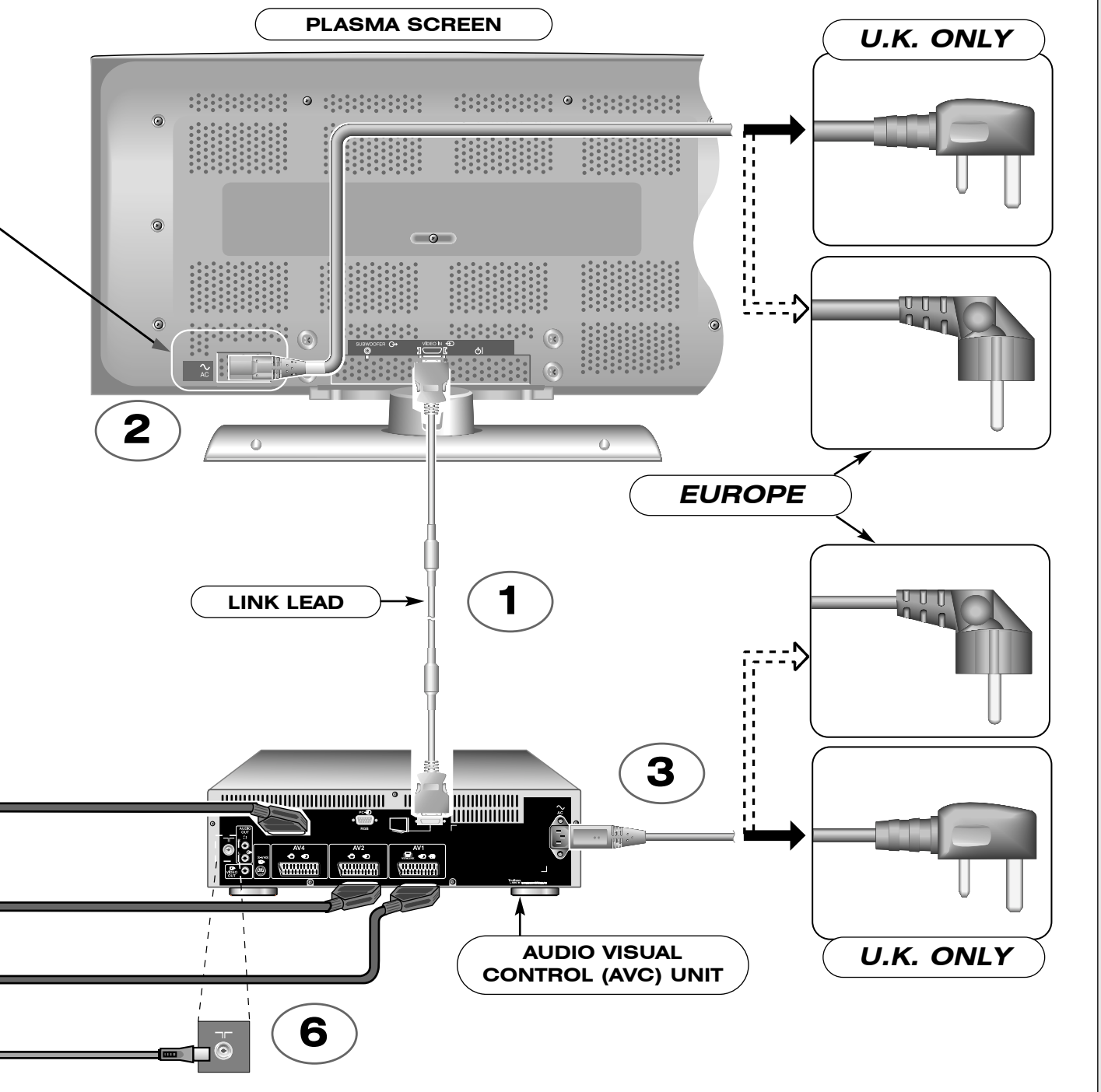
IMPORTANT! When connecting the mains lead to your Plasma screen, please ensure that you always use the Mains Lead with the WHITE SLEEVING.





1. Connect the **LINK LEAD** between the **Plasma Screen** and **AVC Unit**.
2. Connect the **Mains lead** with the **WHITE SLEEVING** to the **Plasma Screen**.
3. Connect the **Mains lead** with **NO Sleeving** to the **AVC Unit**.

***** Scart leads should be fitted between your TV and other equipment to enhance your picture and sound quality. Scart leads are essential if you have a stereo TV and VCR and wish to obtain stereo sound from your equipment. These leads can be purchased from your Hitachi dealer or any good High Street electrical retailer.



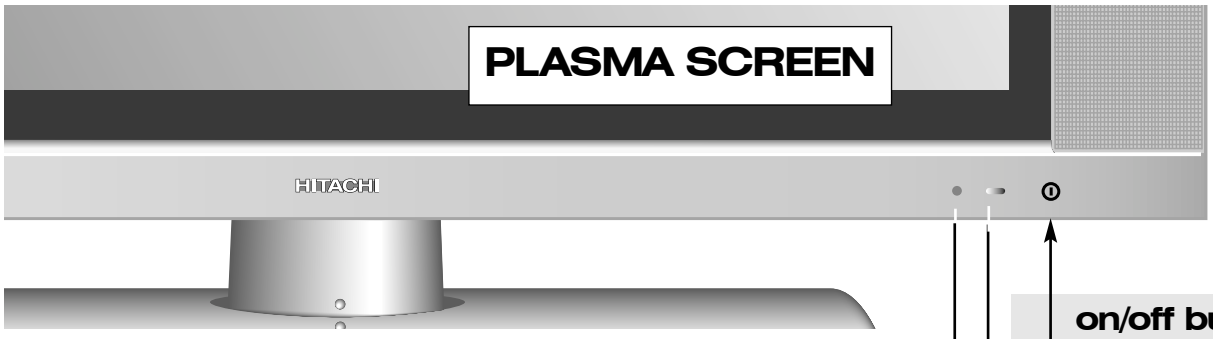
4 Connect **aerial connection lead** to the **Digibox 'in'** socket marked ⌐⌐ .

5 Connect **Digibox 'out'** to **VCR 'in'** socket marked ⌐⌐ .

6 Connect **VCR 'out'** to **TV 'in'** socket marked ⌐⌐ .

VHS video equipment should be connected to the AV1 scart socket located at the rear of your TV. A dedicated programme number may be assigned to AV1, allowing you easier access to external equipment viewing. How to assign an AV signal to dedicated programme numbers is explained in **signal source entry** section.

PLASMA SCREEN



TV mode light

This will be green when your TV is on and red when in standby mode.

infra-red lens

This is for reading commands sent from your remote control handset.

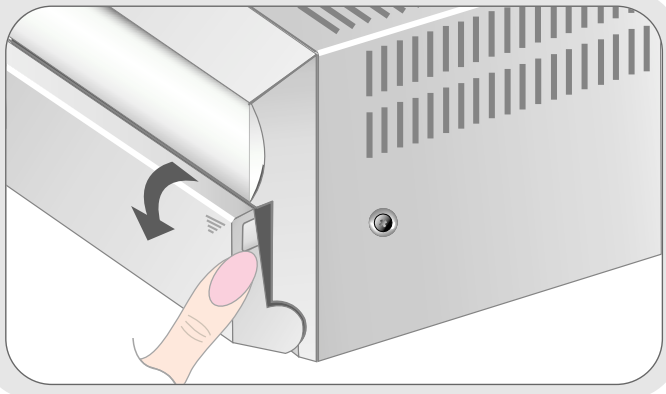
on/off button

(Underside of plasma screen). Use this to switch the plasma screen on and off. (When switched off using this button the screen consumes no power - unlike when in standby mode).

AUDIO VISUAL CONTROL (AVC) UNIT

television controls door panel

To use the controls, pull down gently where shown.



TV mode light

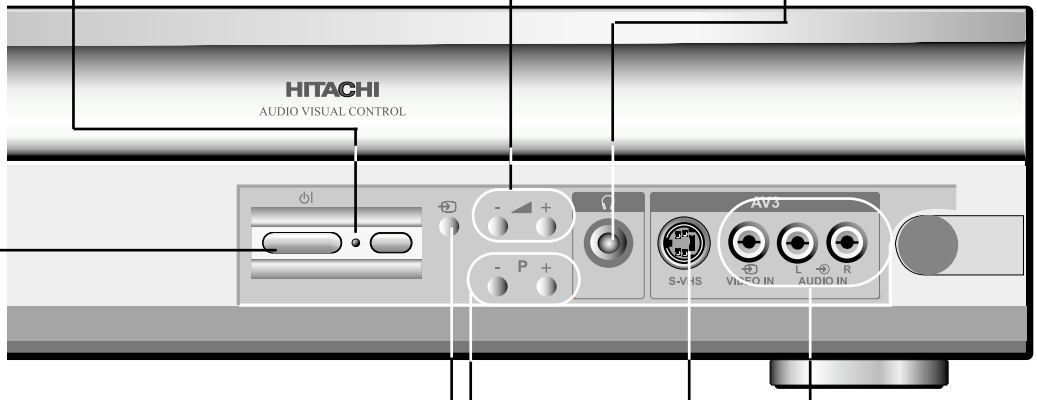
This will be green when your TV is on and red when in standby mode.

volume buttons

Used to increase '+', or decrease '-' your TV's sound .

headphone socket

Used with headphones (3.5mm stereo jack plug required).



standby button

Use this to switch the AVC unit into Standby Mode. (To turn the unit off completely, switch off at the mains).

AV button

Used to select a signal source for external equipment.

programme buttons

Used to change the TV channel up '+' or down '-'

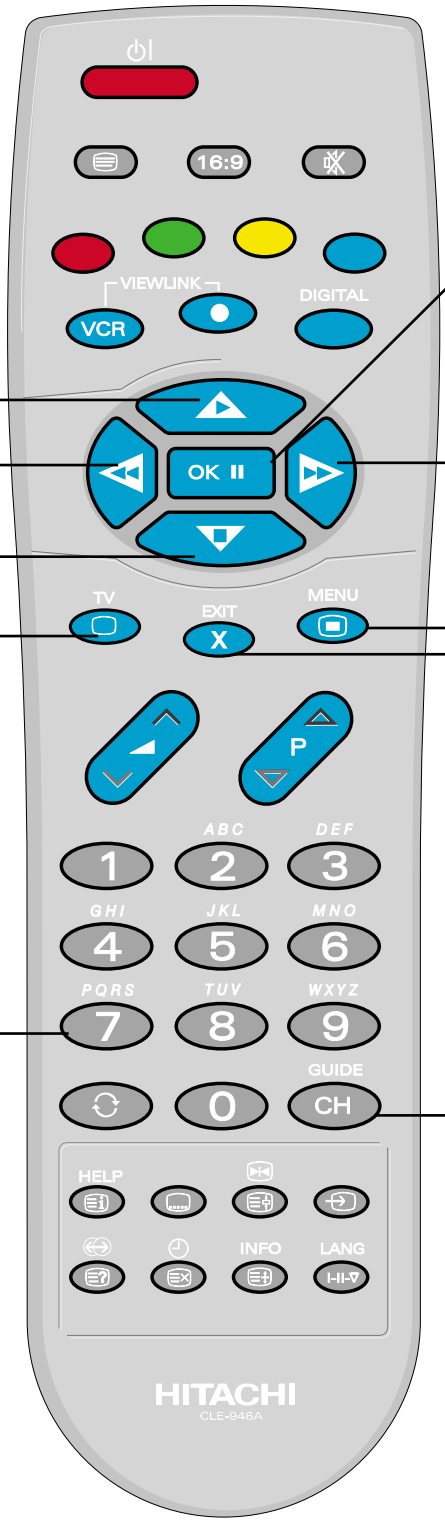
S-VHS socket

This socket is for use with external equipment.

audio/video sockets

These sockets are for use with external equipment.

The handset controls shown below are used when programming your TV and to adjust the sound and picture features.



cursor up

Use this button to move the menu selection box up.

cursor left

Use this button to move the menu selection box left.

cursor down

Use this button to move the menu selection box down.

television

Press this button to leave the menu you are on and return to normal TV operation.

accept

This button is used to confirm a highlighted selection.

cursor right

Use this button to move the menu selection box right.

menu

This button is used to enter the main menu. This is where your TV's features options are displayed.

exit

This button is used to return to the previous on screen menu you were viewing, or to cancel a selection.

frequency

This allows you to directly input known broadcasting CH or frequency numbers.

number/letter buttons

These number buttons can also be used to enter letters, which are required for some features e.g. programme name change etc.
To enter letters: Press the number key twice for the first corresponding letter (written above the key), three times for the second etc.
Example: Press number key 2, twice for 'A', three times for 'B' and four times for 'C'.

The handset controls shown here are used when your TV is in normal operation.

standby

Used to switch your TV in and out of standby mode.

sound mute

This button allows you to switch the TV's sound on and off.

16:9 button

This button allows you to switch between the various wide screen features of your TV (see **wide screen viewing** section).

VCR/record

Press both buttons simultaneously to record what is being viewed (only available if VCR is Viewlink compatible -see **viewlink** section).

VCR/stop

Press both buttons simultaneously to stop recording (only available if VCR is Viewlink compatible - see **viewlink** section).

programme controls

Used to change channels either up '+' or down '-'.

volume controls

Used to increase '+' or decrease '-' your TV's volume.

CH frequency

This allows you to directly input known broadcasting CH or frequency numbers.

AV select

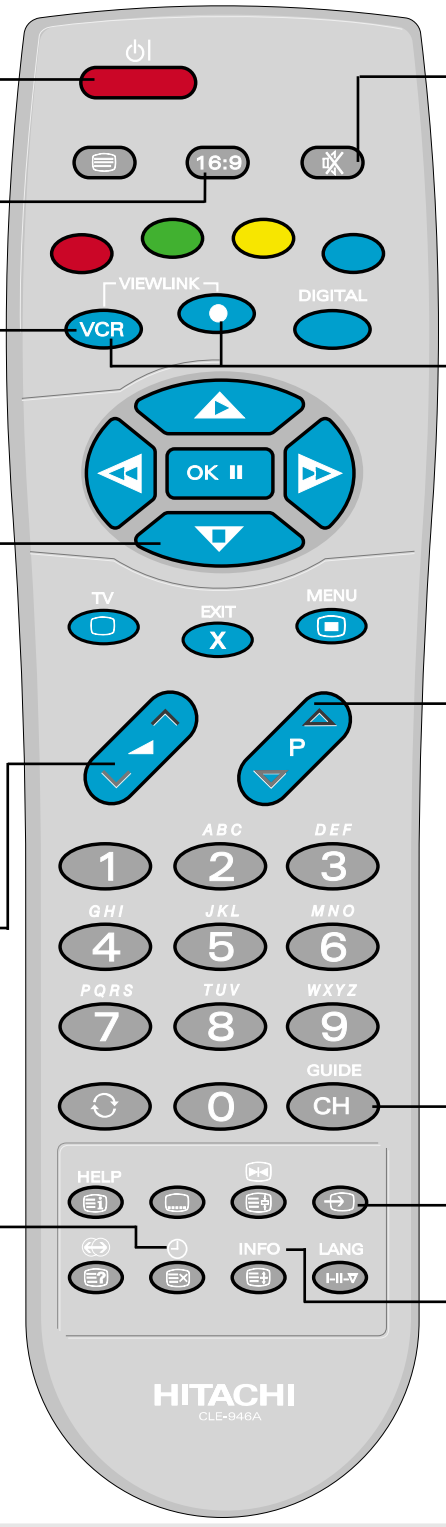
Used to select a signal source for external equipment.

time

Use this button to display the current time on screen.

INFO info

Press this button to view the current TV status.



VCR Operation

Your handset incorporates controls for operation of HITACHI Video Cassette Recorders. These controls are PLAY, STOP, REWIND, FAST FORWARD, PAUSE, STANDBY, PROG +/-, and MENU.

To PLAY : Press the VCR and Play buttons on your handset simultaneously.

To STOP : Press the VCR and Stop buttons on your handset simultaneously.

To REWIND : Press the VCR and Rewind buttons on your handset simultaneously.

To FAST FORWARD : Press the VCR and Fast Forward buttons on your handset simultaneously.

To PAUSE : Press the VCR and Pause buttons on your handset simultaneously.

To enter STANDBY : Press the VCR And Standby buttons on your Handset Simultaneously.

To change PROG +/- : Press the VCR And Prog+/- buttons on your Handset Simultaneously.

To enter the MENU : Press the VCR And Menu buttons on your Handset Simultaneously.

The handset controls shown here are used when you are operating Teletext.

teletext

Press this button to use the Teletext services.

colours

(red, green, yellow, blue)
On certain pages in teletext, these will have coded instructions i.e. a shortcut to a teletext page or title.

swap

In teletext mode - views the previous page.
In TV mode - returns from your current viewing channel to the previous one.

television

Press this button to return to normal TV operations when in the teletext mode.

index

Pressing this button will take you to the index.

hold

Use this to 'freeze' the teletext page on display to prevent the page changing (press again to continue).

reveal

Used in Teletext mode to show hidden information eg. quiz pages answers.

expand

Use this button to expand the size of the teletext page on view.

update

Restores TV picture whilst the TV is looking for the entered Teletext page.

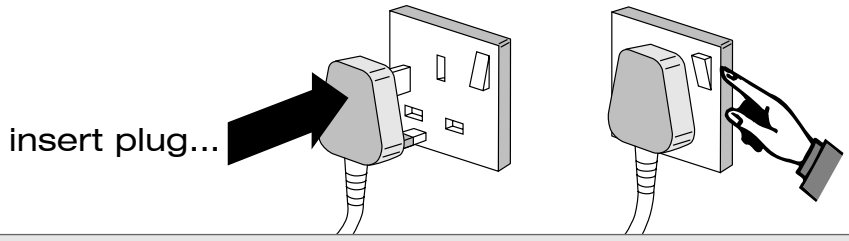
subtitles

Use this to access a subtitle service directly rather than through a teletext service (subject to subtitle service broadcasting).

See 'Teletext operation' section for details of Teletext services

connecting to the mains socket

Important - If you have not already done so, please read the **television safety** section before connecting your television and external equipment.

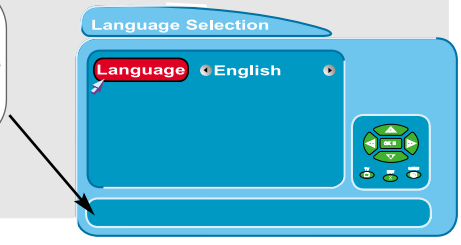


important note on VCR and satellite

Do not switch your TV on until all external equipment is connected. If you have a Video Cassette Recorder or a Satellite receiver connected to this TV please ensure that they are switched on before automatic tuning begins. In the case of a VCR, if it is not Viewlink compatible, insert a pre-recorded tape and begin playback of your equipment. If it is Viewlink compatible leave VCR in Standby. (See **viewlink** section of this manual for details). With a Satellite receiver select Sky News. These measures ensure that all your external equipment is tuned in during the autotune procedure.

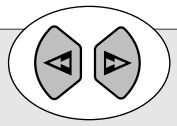
important note - on-screen help

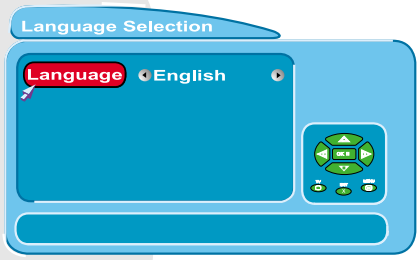
When using the menus of your Television, extra on screen help will be displayed in this window.



1 To make your programme tuning easier, HITACHI have installed an automatic tuning procedure to find the programmes. Switch your Plasma screen and AVC (Audio Visual Control) unit on.

2 The first screen viewed will ask you to choose the language of your TV's display. Use the LEFT/RIGHT cursor buttons to choose your language.



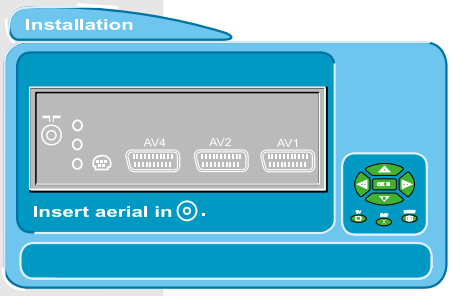


3 Once highlighted, accept selection.

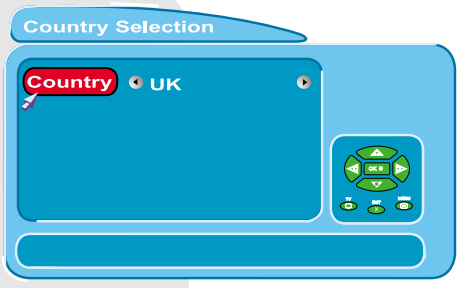
OK

4 The next screen viewed will ask you to insert your aerial connection lead.
If you are satisfied all external equipment has been connected, press the OK button on your handset and AUTOTUNE will begin.

OK



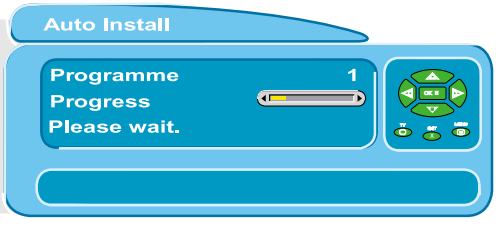
5 Next, the country screen requires you to select the country in which you will be watching your TV. Use the LEFT/RIGHT buttons to adjust.



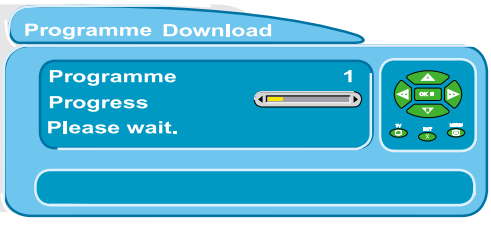
6 Once the country of choice is viewed, press the OK button to continue.

OK

7 Your TV will now search through the frequencies, storing them in order.



PLEASE NOTE : If your VCR is Viewlink compatible, your TV will now download the programme information - see ***viewlink*** *section of this manual.*

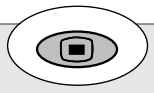


...notes on manual tuning

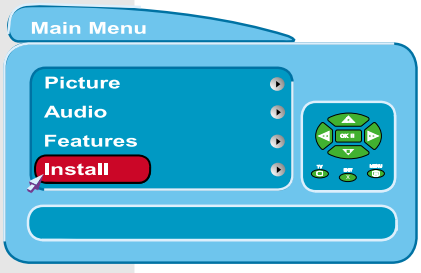
As well as an automatic tuning procedure your HITACHI television also allows you to input broadcast frequencies through a number of different entry methods. Follow the steps below and choose one of the 4 entry methods to input broadcast frequencies.

VCR should be tuned into Programme 0.
Follow the steps below to tune in your VCR if it was not found during Autotune. See **programme sort** section to move to channel 0.

1. Press the MENU button. The MAIN MENU appears.



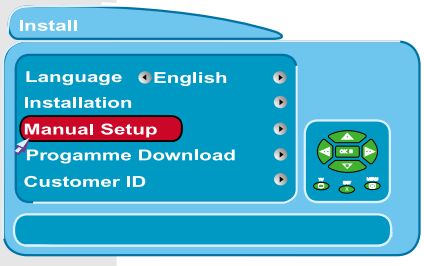
2. Press the cursor DOWN button to select INSTALL.



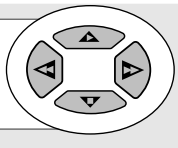
3. Once highlighted, accept selection.

4. Press the cursor DOWN button to select MANUAL SETUP.

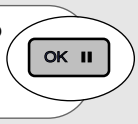
5. Once highlighted, accept selection.

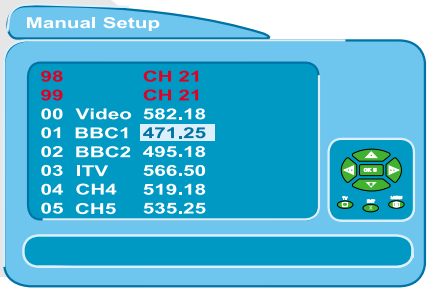


6. Use the cursor keys to move the selection bar over the programme frequency required to be adjusted.



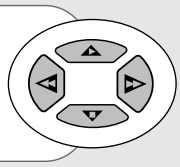
7. Once highlighted, accept the selection to change the frequency. The selection bar will turn blue. It is now ready to change.

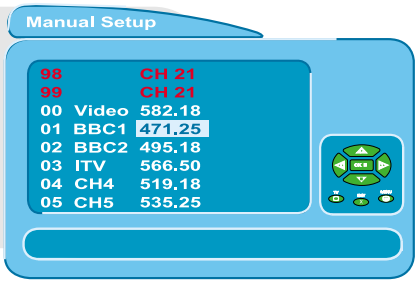




entry method 1

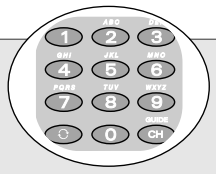
The first option will be to fine tune the chosen frequency either UP or DOWN using the LEFT/RIGHT cursor keys or search tune UP or DOWN using the UP/DOWN cursor keys.

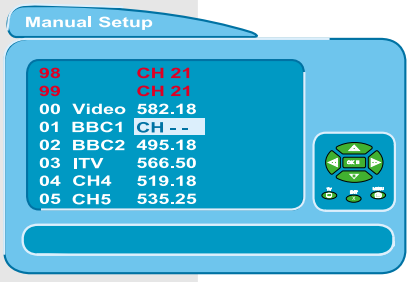




entry method 2

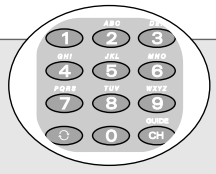
If the CH key (CH) is pressed, you can enter a two digit channel number (CH) using buttons 0 - 9 on your handset.

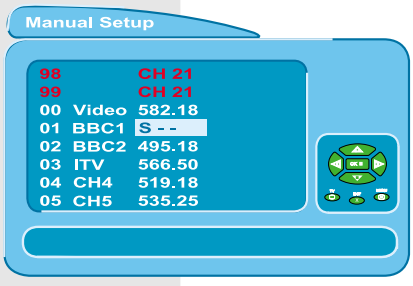




entry method 3

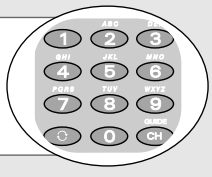
If the CH key (CH) is pressed again, you can enter a two digit S-band number using buttons 0 - 9 on your handset.

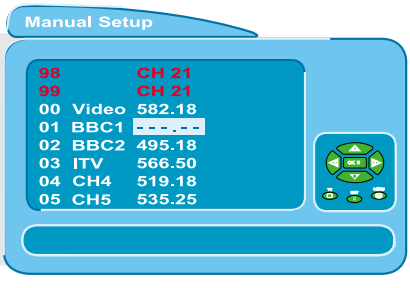




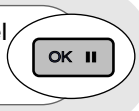
entry method 4

If the CH (CH) key is pressed again, you can manually input a five digit frequency (if known) using buttons 0 - 9 on your handset.



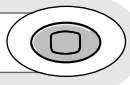


8 Once the method of entry has been decided upon and the new frequency or channel entered, this can then be stored in the TV's memory by pressing the OK button.



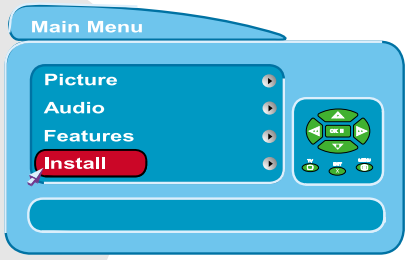
If you have a Viewlink compatible video, press the AV key (→) to transfer any information changes to your VCR.

9 To return to normal TV operation, press the TV button on your handset.



1 Press the MENU button. MAIN MENU appears.

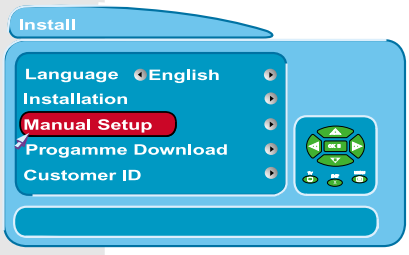
2 Press the cursor DOWN button to select INSTALL.



3 Once highlighted, accept selection.

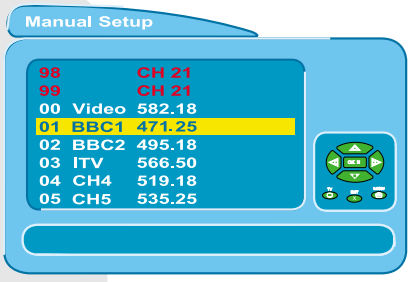
4 Press the cursor DOWN button to select MANUAL SETUP.

5 Once highlighted, accept selection.



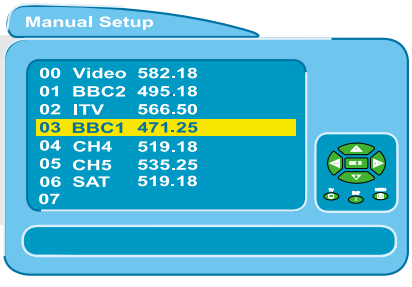
6 Use the UP/DOWN cursor keys to select the programme you wish to move.

7 Once highlighted, accept selection.



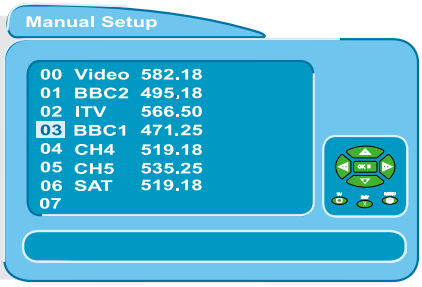
When a channel has been selected, you also have the option to 'hide' a programme - this makes your TV skip the hidden channel when the UP/DOWN program controls are used to change channels. Press the '0' digit on your handset and you will see the text within your chosen selection turn red. Your selection is hidden. Press the '0' button again to 'unhide' the selection. If a hidden channel is to be viewed, you can achieve this by entering the channel number with the handset digits 0 to 9.

8 Using the UP/DOWN buttons again you can move the selection to occupy a new position of your choice.
Note: Using the P+/P- buttons for movement will make selections in multiples of 8.



9 Once this has been done, accept selection and the chosen programme will now occupy its new position. Repeat if necessary.

If you have a Viewlink compatible video, press the AV key to transfer any information changes to your VCR.

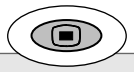


10 To return to normal TV operation, press the TV button on your handset.

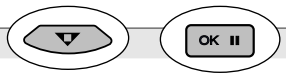
...notes on programme name change

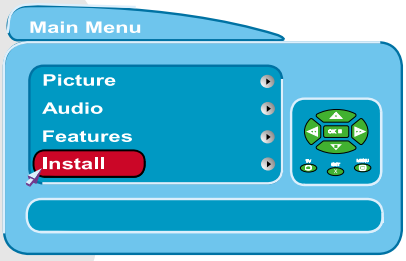
Programme name change can be very useful if you connect external equipment to your television. For example, if you have a games machine connected, you can name the allocated channel 'GAME', making it easier to find.

1 Press the MENU button. The MAIN MENU appears.

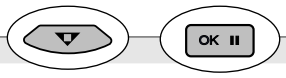


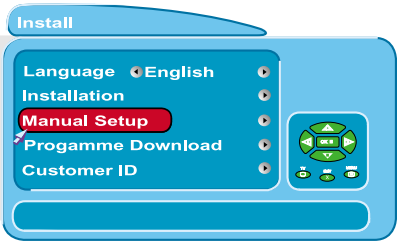
2 Press the cursor DOWN button to select INSTALL. Once highlighted, accept selection.



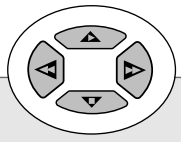


3 Press the cursor DOWN button to select MANUAL SETUP. Once highlighted, accept selection.

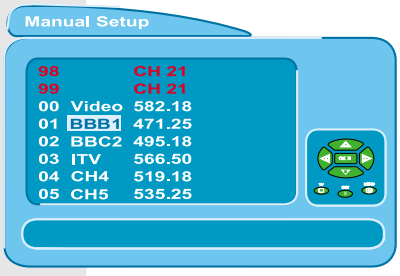




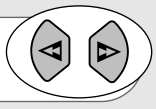
4 Use the cursor keys to move the selection bar over the NAME required to be adjusted.



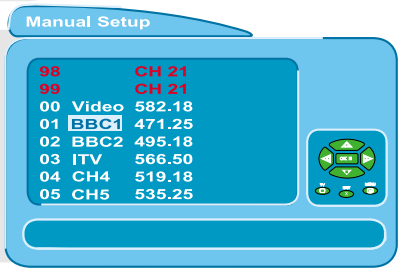
5 Once highlighted, accept selection to start editing name.



6 Press the LEFT/RIGHT cursor keys to select the character you wish to change.



7 Press the UP/DOWN cursor keys or 0-9 number keys * to edit the name.

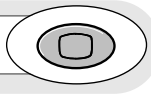


*The number buttons on your handset can also be used to enter letters.
To enter letters: Press the number key twice for the first corresponding letter (written above the key), three times for the second etc.
e.g.: Press number key 2, twice for 'A', three times for 'B' and four times for 'C'.

8 Press OK key to confirm change or X key to cancel change and restore previous name.

If you have a Viewlink compatible video, press the AV key to transfer any information changes to your VCR.

9 To return to normal TV operation, press the TV button on your handset.



...notes on programme download

Programme download can be useful, if, for any reason you have to change your VCR. Providing you have a viewlink compatible VCR, this feature enables the user to download the preset programmes from the TV which saves having to tune-in the new VCR.
See 'viewlink' feature for details.

What is *Viewlink*?

The Viewlink function allows the direct communication between your TV and a Viewlink compatible VCR, enabling features such as downloading of tuning information from the TV to the VCR, making TV/Video setup easier.*

To use *Viewlink* functions...

1. A *Viewlink* compatible VCR is necessary. *
2. The VCR must be connected to the AV1 socket on the TV by a fully wired scart cable.

* A *Viewlink* compatible VCR means a Hitachi VCR with the viewlink logo, or a VCR with one of the following logos:

- "Q-Link" (a trademark of Panasonic Corporation)
- "Data Logic" (a trademark of Metz Corporation)
- "Easy Link" (a trademark of Philips Corporation)
- "Megalogic" (a trademark of Grundig Corporation)
- "Smartlink" (a trademark of Sony Corporation)
- "T-V Link" (a trademark of JVC Corporation)

These VCR's may support some or all of the features described - refer to the VCR instruction manual.

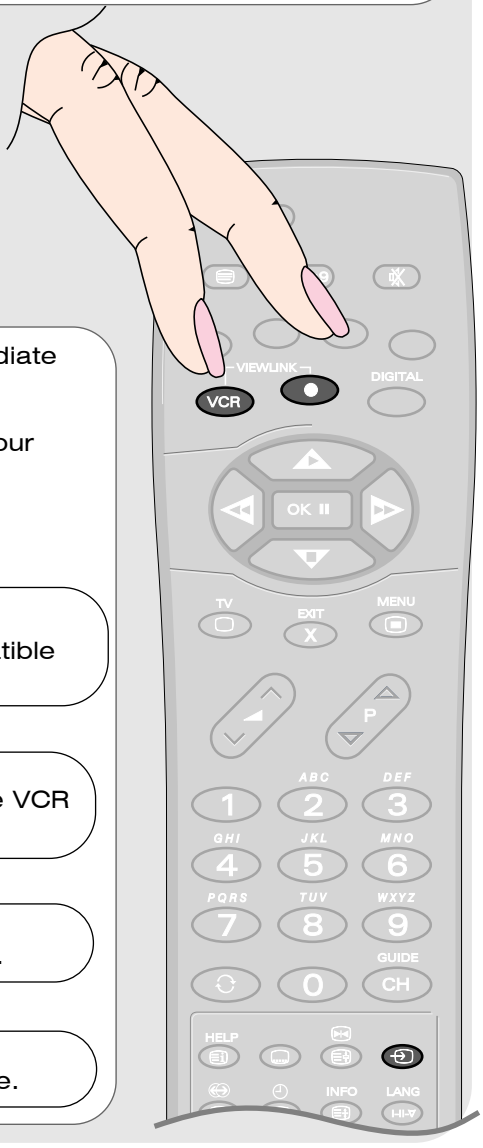
Viewlink features

Preset Download

This function enables a download of tuning information from the TV to the VCR e.g. programme order/name etc. This helps to ensure that correct recordings are made.
The Preset Download function automatically begins when initial setup is complete of AUTOTUNE or the AV key (→) is pressed whilst in MANUAL SETUP.
This function can also be started from the VCR - refer to VCR instruction manual.

PLEASE NOTE: If "*No Viewlink compatible VCR found"* is displayed, the download was not performed correctly. Before trying to download again, ensure the following:

- The VCR is turned ON;
- The VCR is connected to the AV1 socket;
- The scart cable is fully wired;
- The VCR is *Viewlink* compatible.



Direct TV Recording

What You See Is What You Record - This will allow the immediate recording of the programme currently being viewed on the TV.

To Record - Press the VCR and record buttons (VCR) (●) on your handset simultaneously. A message will appear on the screen showing what is being recorded, or if it is not possible to record. (Examples are shown below and on the opposite page).

No Viewlink Compatible VCR Found

The television is trying to communicate with a Viewlink compatible VCR, and cannot find one.

Feature Not Supported by VCR

The television is trying to get the VCR to perform a function the VCR does not support.

VCR Not Recording - No Tape

The VCR cannot record because there is no tape inserted.

VCR Is Currently Playing

The VCR cannot record because it is currently playing a tape.

Viewlink features - continued

Direct TV Recording - continued

VCR Recording From TV

The VCR is recording from the televisions tuner. If the channel is changed on the television, it will affect the recording. However, menus and OSD's will not affect the recording.

VCR Recording from VCR Tuner

The VCR is recording from its own tuner, using a frequency sent by the television, i.e. not one of the VCRs own preset channels. The television can be switched off and recording will not be affected.

VCR Recording Preset

The VCR is recording one of its own channels. The television can be switched off and recording will not be affected.

VCR Recording from VCR External

The VCR is recording from one of its AV connections. The television can be switched off and recording will not be affected.

Tape Is Write Protected

The VCR cannot record because the tape write protect tab is missing.

VCR Has No Signal To Record

There is no signal on the selected VCR input (VCR tuner or external AV connection).

VCR Is Already Recording

The VCR cannot record because it is already recording.

VCR Has Tape Problems

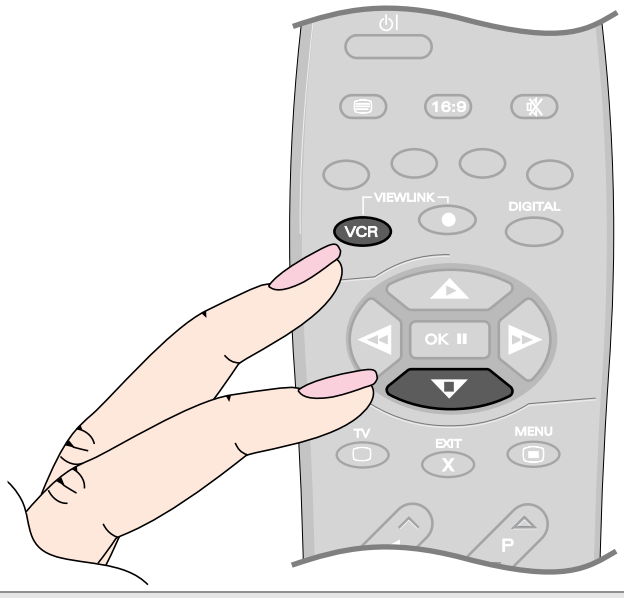
There is a problem with the tape in the VCR (tape tangled, faulty, snapped etc.).

VCR Not Recording

The VCR cannot record because of a problem other than listed.

To Stop Recording - Press the VCR and Stop buttons VCR ▽ on your handset simultaneously. Recording will stop.

To operate via the VCR - refer to VCR instruction manual.



PLEASE NOTE: Generally, the VCR cannot record a TV channel that cannot be received properly by the VCR's tuner, even though you can view that channel on the TV. However, some VCR's can use the TV's output to record a TV channel. For details, refer to your VCR instruction manual.

TV Auto Power On

If you insert a tape and press 'PLAY' on the VCR whilst the TV is in 'Standby' mode, the TV will automatically switch ON and select AV1 so that you can view the tape.

VCR Auto Power Standby

If the TV is switched into 'Standby' mode, the VCR will also switch into 'Standby' mode, providing the VCR is not in operation. (If rewinding a tape, the VCR will not switch into 'Standby' until rewinding has stopped.)

VCR Image View

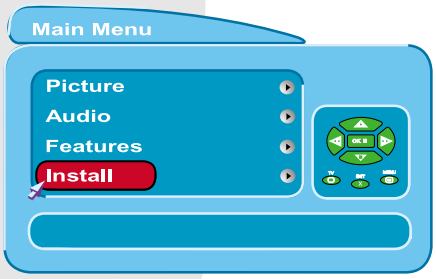
If the TV is in 'Standby' mode, and a VCR menu is operated, the TV will automatically switch ON and the images from AV1 terminal will be displayed on screen.

...notes on Customer I.D.

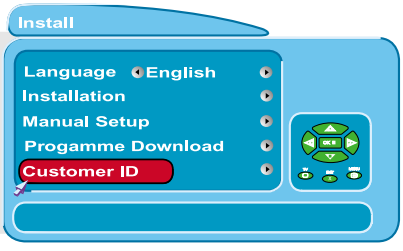
The Customer I.D. feature allows the user to enter a personal security code and address information into the television's memory, so that in the unfortunate event of theft, it will help the Police trace the owner. Please follow the steps below.

1 Press the MENU button. The MAIN MENU appears.

2 Press the cursor DOWN button to select INSTALL. Once highlighted, accept selection.

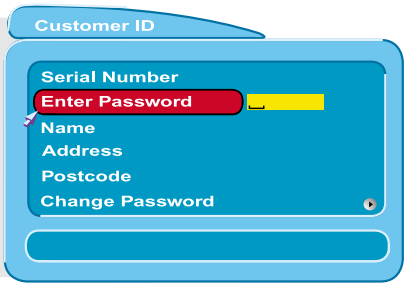


3 Press the cursor DOWN button to select CUSTOMER I.D. Once highlighted, accept selection.



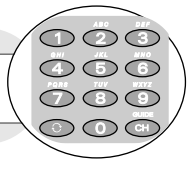
4 'ENTER PASSWORD' is highlighted.

5 Press O.K. to accept selection.



PLEASE NOTE: No other selection is available at this point.

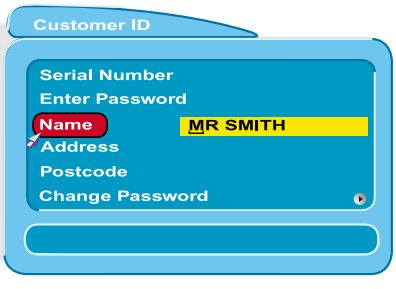
6 Enter '**1234**' on handset - *this password is preset at the factory.*



7 Press O.K. to accept selection.

8 Press the cursor DOWN button to select NAME. Once highlighted, accept selection.

9 Press the LEFT/RIGHT cursor keys to select each character and UP/DOWN cursor keys, or 0-9 number keys * to change each character (maximum of 16).



*The number buttons on your handset can also be used to enter letters.
To enter letters: Press the number key twice for the first corresponding letter (written above the key), three times for the second etc.
e.g.: Press number key 2, twice for 'A', three times for 'B' and four times for 'C'.

10 Press O.K. to complete. OK

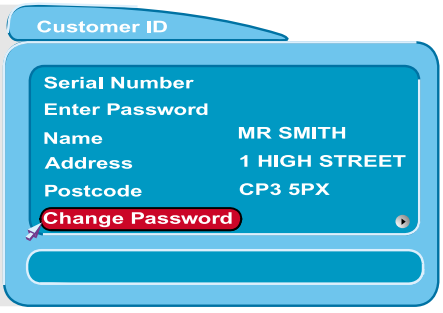
11 Repeat steps 6, 7 and 8 to highlight and change your address and postcode. If you make a mistake, or wish to cancel the change of address, press X key (X) on your handset.

PLEASE NOTE : After you have changed your address etc., please see 'password change' section of this manual before returning to normal TV operation.

...notes on Changing your Password

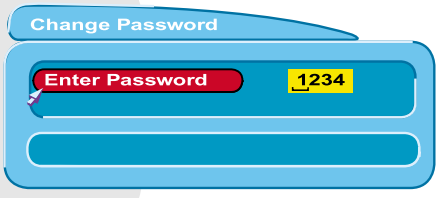
We recommend that the user changes the password to one of their own choice once all personal details have been entered. Please see below for instructions.

1 Whilst still in CUSTOMER I.D. menu, press the cursor down button to select CHANGE PASSWORD. Once highlighted, accept selection.



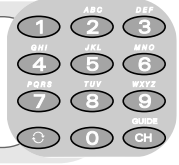
2 'ENTER PASSWORD' will be highlighted.

3 Press O.K. to accept selection.



4 Enter your chosen 4 digit password using the LEFT/RIGHT cursor keys to select each character and UP/DOWN cursor keys, or 0-9 number keys * to change each character.

*The number buttons on your handset can also be used to enter letters.
To enter letters: Press the number key twice for the first corresponding letter (written above the key), three times for the second etc.
e.g.: Press number key 2, twice for 'A', three times for 'B' and four times for 'C'.



5 Press O.K. to complete. OK

6 To return to normal TV operation, press the TV button on your handset.

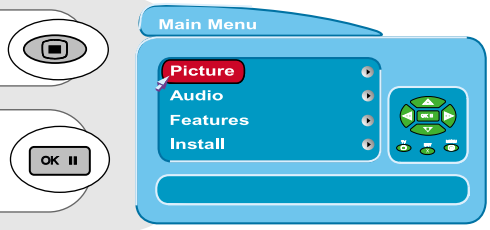
IMPORTANT! For future reference, write your password in the box provided and keep in a safe place!

PASSWORD

— — — —

For picture and sound values, moving the cursor ***left will decrease*** values, whilst moving the cursor ***right will increase*** values.

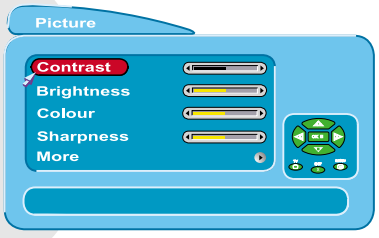
1. Press the MENU button to obtain MAIN MENU.



2. The MAIN MENU highlights the PICTURE option automatically - press OK to select.

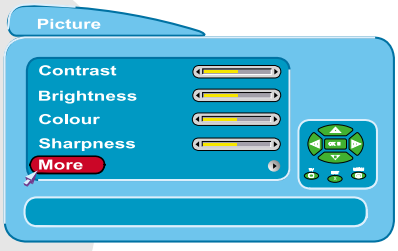
3. Select the picture control to be adjusted by using the UP / DOWN cursor buttons.

4. Once highlighted, adjust the chosen controls by pressing the LEFT/RIGHT cursor buttons.



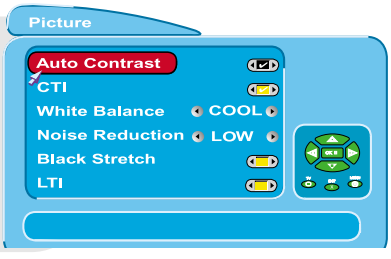
5. To select MORE options, use the UP/DOWN buttons to highlight selection and then press OK to confirm.

6. Select the picture control to be adjusted by using the UP/DOWN cursor buttons.



7. Once highlighted, adjust the chosen controls by pressing the LEFT/RIGHT cursor buttons (for explanation see below).

8. The values changed will remain until they are next altered. Press the TV button on your handset to return to normal TV operation.



Auto Contrast

This control automatically adjusts the brightness of your picture to avoid saturation (bright picture).

CTI

Colour Transient Improvement - This control lets you improve the clarity of your television's colour edges.

White Balance

NORMAL - gives an equally balanced spectrum of colour , WARM - exaggerates the RED tones of your picture, and COOL - exaggerates the BLUE tones of your picture.

Noise Reduction

Helps reduce the noise interference visible on your television, especially in weaker signal reception areas. Select OFF/LOW/MID/HIGH to compensate for noisy pictures.

Black Stretch

This control turns all dark grey parts of the picture black.

LTI

Luminance Transient Improvement - this improves the sharpness of your television's picture so it appears less blurred.

Hue

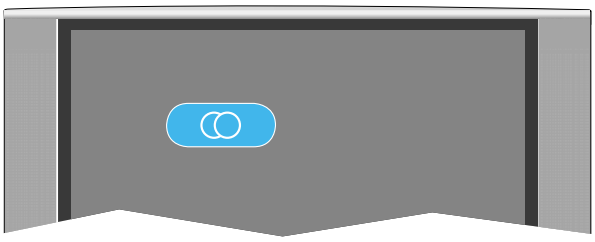
This control allows you to adjust the colour of your television's picture when viewing NTSC signals only.

...notes on NICAM features

NICAM is a method for transmitting and receiving stereo sound. If your TV is unable to receive NICAM because of the wrong geography, climate etc., or when NICAM in not transmitted in your location it will produce a monaural sound source.

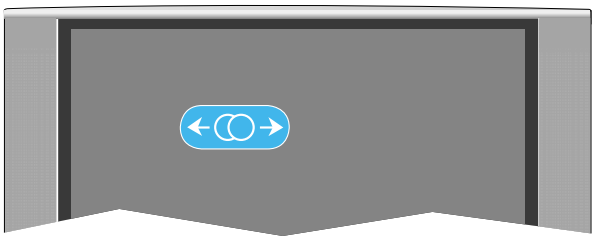
stereo

This effect produces NICAM digital stereo sound from your TV. Use this mode for the majority of TV viewing. When selected the stereo symbol appears.
Use the I-II-▽ button on your handset to switch to stereo.



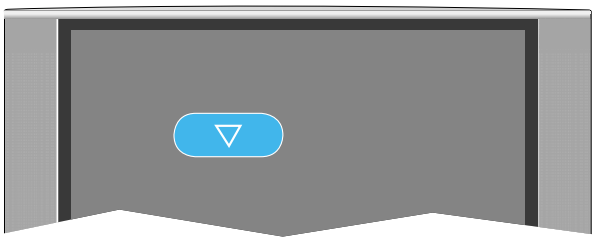
wide stereo

This effect enhances NICAM digital stereo by forcing a wide area of sound from the TV. Use this mode when viewing action movies or sports events to obtain spatialising acoustic performance.
Use the ⇔ button on your handset to switch to wide stereo.



monaural

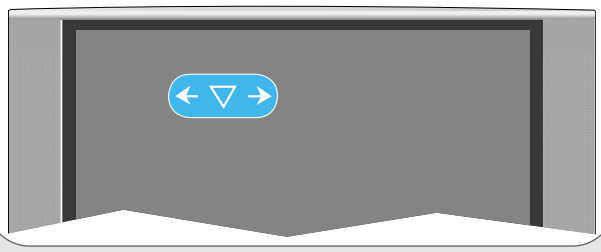
In this mode the TV produces a single sound source. Some stereo signals can be poor in adverse weather conditions, and mono should be selected to avoid poor sound.
Use the I-II-▽ button on your handset to switch to mono.



pseudo stereo

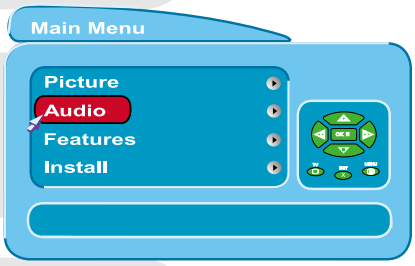
This creates an ambient sound from mono signals imitating that of stereo sound.
Use the ⇔ button on your handset to switch to pseudo stereo sound.

Note: Pseudo stereo is only available in monaural transmissions.



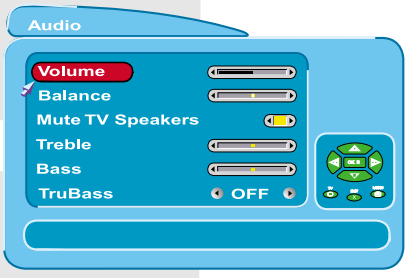
1 Press the MENU button to obtain MAIN MENU.

2 Press the cursor DOWN button to select AUDIO.



3 Once highlighted, accept selection.

4 Select the control to be adjusted by using the UP/DOWN cursor buttons.



5 Once highlighted, adjust the chosen controls by pressing the LEFT/RIGHT cursor buttons.

volume control

This control is used to increase, or decrease the sound from your TV's speakers. This also sets the volume at switch-on.

balance

This control is used to adjust balance of sound from left to right and vice versa.

mute TV speakers

This option is used to switch your television's internal speakers ON or OFF. The headphone and rear RCA outputs are not affected.

treble

This control is used to increase, or decrease the treble sound from your TV's speakers.

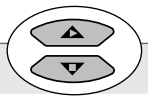
bass

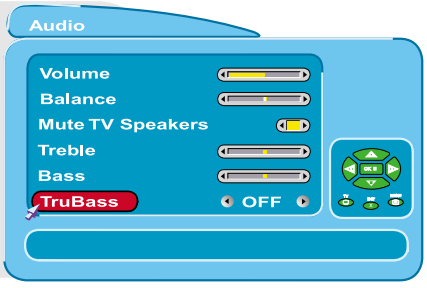
This control is used to increase, or decrease the bass sound from your TV's speakers.

TruBass

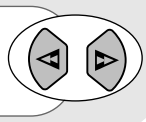
TruBass takes advantage of the ability of the human ear to be able to distinguish between two different tones. By using this ability, TruBass reproduces bass sound which sometimes cannot be heard. The options are OFF/LOW/MED/HIGH. Adjust this control to suit your personal taste.

6 In the AUDIO menu, select the TRUBASS option using the UP/DOWN cursor buttons.



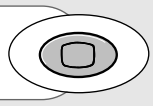


7 Once highlighted, adjust the control by pressing the LEFT/RIGHT cursor buttons. (Options are OFF/LOW/MED/HIGH)



PLEASE NOTE : If the volume level is high, low frequency sound may be distorted. In this case, TruBass should be set to LOW or OFF. If a subwoofer speaker is connected to the TV, Trubass should be set to OFF.

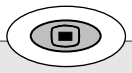
8 To return to normal TV operation press the TV button on your handset.

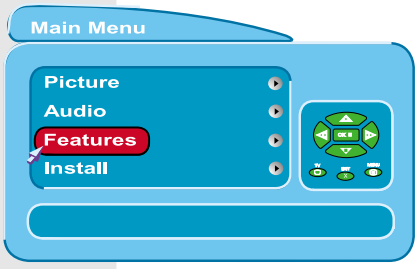


...notes on Sleep Timer

This feature is used to automatically place your TV into standby mode after a set number of minutes - use the RIGHT/LEFT cursor buttons to set the timer between 5 and 120 minutes.
When the timer has only a minute left this will be shown on the screen as a countdown from 59 seconds to zero, after which your TV's status will be standby.

1. Press the MENU button to obtain MAIN MENU.

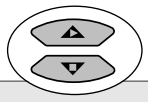


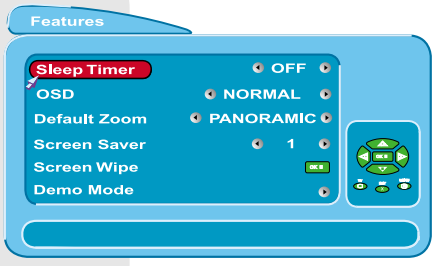


2. Press the cursor DOWN button to select FEATURES.

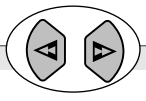
3. Once highlighted, accept selection.

4. Use UP/DOWN cursor buttons to select option to adjust.

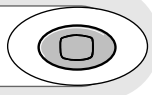




5. Use LEFT/RIGHT buttons to adjust the number of minutes to be used in your television's countdown.



6. To return to normal TV operation press the TV button on your handset.

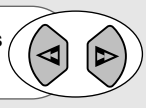


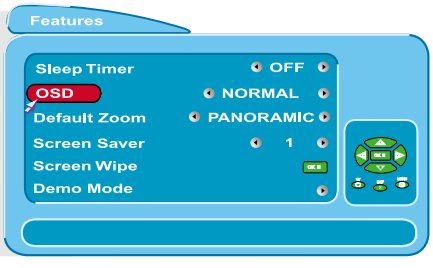
...notes on O.S.D. (On Screen Display)

This feature is used to choose whether the On Screen Display (O.S.D.) appears on screen, or to select the amount of time it appears on-screen, in normal TV viewing. Please see below for details.

1. REPEAT STEPS 1 TO 4 ABOVE.

5. Use LEFT/RIGHT buttons to adjust the O.S.D. options i.e. OFF/NORMAL/FAST.



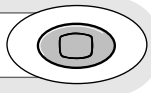


OFF
O.S.D. does not appear on programme change, volume etc.

NORMAL
O.S.D. appears for a few seconds on programme change, volume etc.

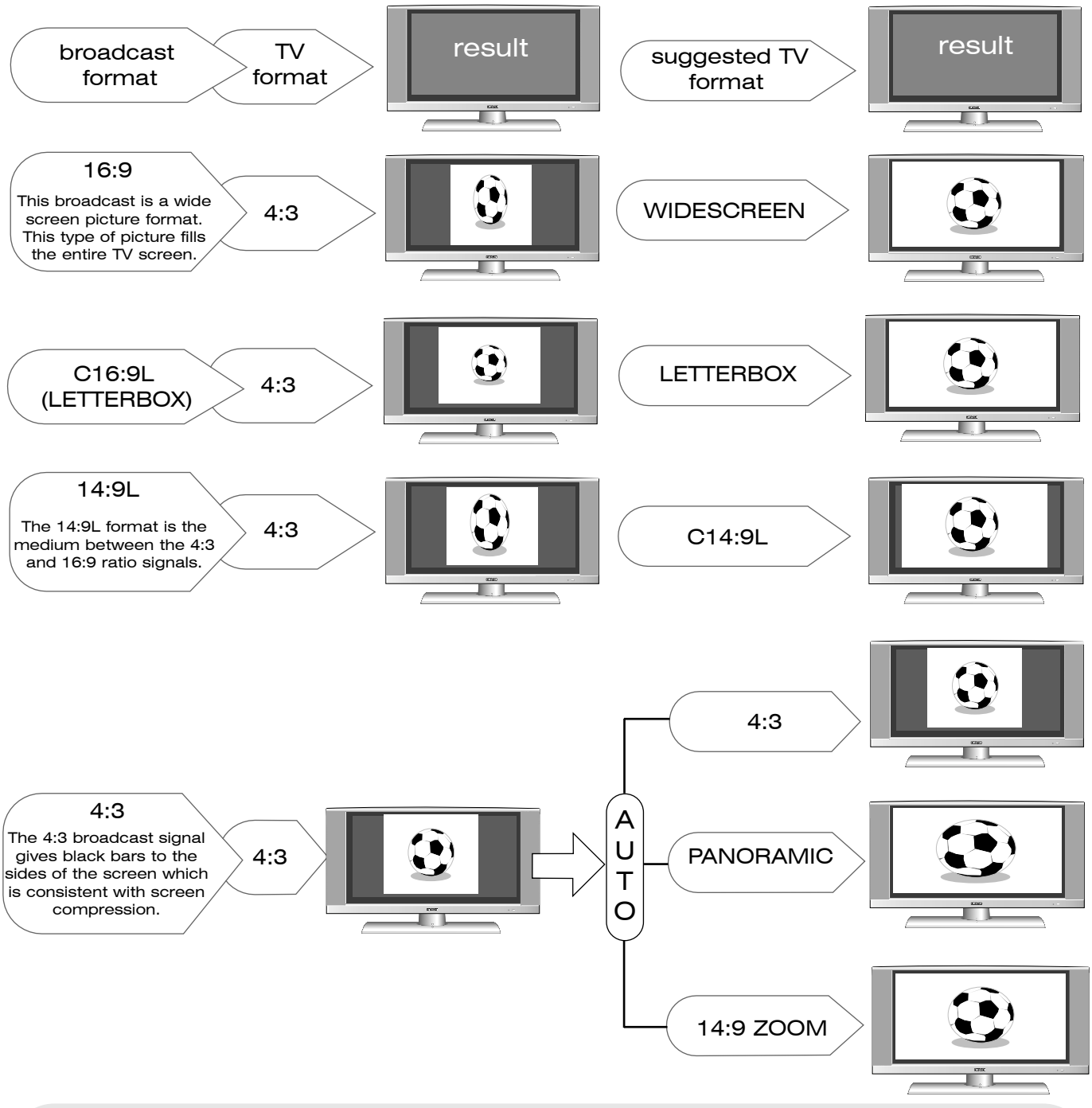
FAST
O.S.D. disappears faster on programme change, volume etc.

6. To return to normal TV operation press the TV button on your handset.



...notes on wide screen features

Various broadcast stations now transmit movies and programmes in true wide screen format.
Your TV detects these signals and automatically switches your TV to the correct viewing format. However, some broadcasters do not transmit this automatic sensing signal, and so your TV will not recognize which format is being transmitted. Your viewing format can be selected manually by simply pressing the (16:9) key on your handset to scroll through the viewing format options.
See the examples below for the available viewing formats.



...notes on auto mode

The Auto format is also one which can be selected manually. Auto mode automatically detects various screen formats that are transmitted in either conventional (4:3) or wide screen (16:9 or 14:9) format. After detecting which signal is being transmitted, the TV will automatically switch to the correct screen ratio.

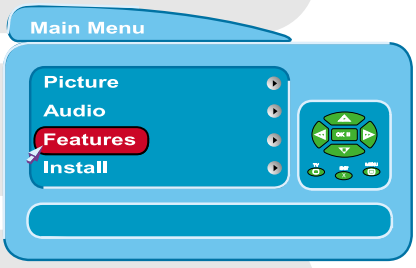
...notes on Default features

Your TV also has default features which can control the viewing format of your TV's picture.
See below for entry into and adjustment of these features.

...notes on Default Zoom

Various broadcast stations now transmit WSS (Wide Screen Signals) which identify the picture format movies and programmes are broadcast in.
Your TV can detect these Wide Screen Signals and automatically switch to the correct format. However, some broadcasters do not transmit WSS, and so your TV will not recognize which format is being transmitted. Therefore, DEFAULT ZOOM is used to choose your picture requirements when a Wide Screen Signal has not been sent or has not been detected.

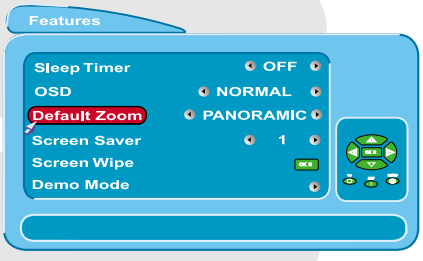
1. Press the MENU button to obtain MAIN MENU.



2. Press the cursor DOWN button to select FEATURES.

3. Once highlighted, accept selection.

4. Use UP/DOWN cursor buttons to select option to adjust.



5. Use LEFT/RIGHT buttons to select DEFAULT ZOOM standard.

6. To return to normal TV operation press the TV button on your handset.

...notes on Teletext

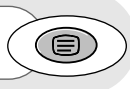
Teletext is an on screen information magazine and it is entered by pressing the teletext button on your handset - a page similar to the one below will appear. Select the topic you want to view by entering a three digit number on your handset corresponding to the page number eg. press 1, 0, 1 for the News Headlines.
Alternately, press a coloured button which relates to one of the topics at the bottom of the screen (the Fastext service), e.g. press the green button on your handset for the sport magazine.

magazine page number
magazine name
date
time
magazine title
page contents
Fastext/favourite pages
P100 CEEFAX 2 100 Wed 19 Mar 15:49/06
BBC CEEFAX
CEEFAX AT-A-GLANCE PRESS HOLD
NEWS HEADLINES 101 LOTTERY 555
NEWS INDEX 102 BACKBEAT 560
ELECTION 97 120 FREETIME 570
NEWS EXTRA 140 GARDENING 573
CITY BBC2 200 COOKBOOK 580
SPORT 300 ON THE BOX 590
WEATHER 400 TV GUIDE 600
TRAVEL 430 TV LINKS 615
CBBC INDEX 500 RADIO BBC1 640
SUB ZERO 501 EDUCATION BBC2 630
NEWSROUND 510 READ HEAR BBC2 640
SHOWTIME 520 COMMUNITY BBC2 650
SWITCHED ON 540 RACING 660
NEWS EXTRA..NEWS EXTRA..NEWS EXTRA
Home 141 World 142 Politics 143
News Heads Sport TV/Radio Weather

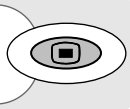
...notes on favourite pages

Your TV is capable of storing up to four of your favourite Teletext pages - maybe the sports page, cookery page or gardening page - the choice is yours. These are accessed, like Fastext, by pressing the colour coded buttons on your handset. Follow the steps below to enter your favourite pages.

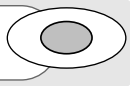
1. Enter Telextext by pressing the Teletext button.



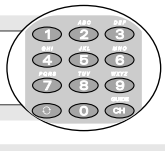
2. Enter favourite page mode by pressing the MENU button (this allows you to swap between Fastext and favourite page mode).



3. Press a colour coded key you wish to use as a favourite page.



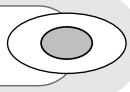
4. Enter the 3-digit page number using the 0-9 buttons on your handset.



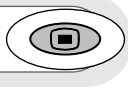
P100 CEEFAX 2 100 Wed 19 Mar 15:49/06
BBC CEEFAX
CEEFAX AT-A-GLANCE PRESS HOLD
NEWS HEADLINES 101 LOTTERY 555
NEWS INDEX 102 BACKBEAT 560
ELECTION 97 120 FREETIME 570
NEWS EXTRA 140 GARDENING 573
CITY BBC2 200 COOKBOOK 580
SPORT 300 ON THE BOX 590
WEATHER 400 TV GUIDE 600
TRAVEL 430 TV LINKS 615
CBBC INDEX 500 RADIO BBC1 640
SUB ZERO 501 EDUCATION BBC2 630
NEWSROUND 510 READ HEAR BBC2 640
SHOWTIME 520 COMMUNITY BBC2 650
SWITCHED ON 540 RACING 660
NEWS EXTRA..NEWS EXTRA..NEWS EXTRA
Home 141 World 142 Politics 143
L XXX XXX XXX XXX

favourite page box

5. Once this number has been entered, press and hold the same colour coded button until the favourite page box turns white, then returns to its original colour.



6. Repeat if necessary using a different coloured key, or press the MENU button to return to normal Teletext viewing.



7. To return to normal TV operation press the TV button on your handset.

camcorder

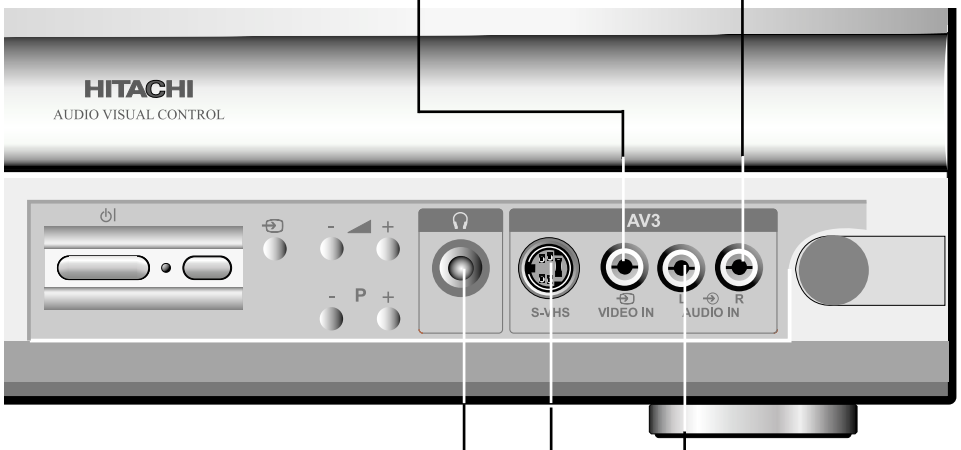
Connecting a camcorder to your TV is easy. First, identify the type of camcorder and its connecting sockets. If it is a standard 8mm type camera then this is likely to have 'RCA' type sockets. If you have an S-VHS or Hi8 camera you may have an S-VHS socket. Open the front control panel door and connect your equipment as detailed here. Switch your TV on and press the TV/AV button on your handset until AV3 is displayed on your TV screen. (If you are using an S-VHS socket, your TV will automatically switch to AV3). Now begin playback operation of your equipment. Alternatively, you could allocate an individual channel number for your camcorder equipment - see **signal source entry**.

video in

Use this in conjunction with a standard 8mm camera or digital camera to see the picture from your equipment.

audio in right

Use this socket, along with audio in left to obtain sound from your external equipment through your TV's speakers.



headphone connection

To use headphones with your TV insert the headphone jack plug (3.5mm) into the corresponding socket.

S-VHS socket

Use this socket with an S-VHS or Hi8 camera to view your recordings.

audio in left

Use this socket, along with audio in right to obtain sound from your external equipment through your TV's speakers.

PLEASE NOTE: Do not connect a camera to the S-VHS/Hi8 socket and the Video in socket at the same time - fit one or the other!

connecting to the mains socket

Important - Please read **television safety** before connecting your television and external equipment.

If digital video broadcasting equipment, computer equipment, DVD or video games are to be connected to this TV, use the AV2 or AV4 socket located on the rear of your TV for RGB input. (Please see page 7).

PLEASE NOTE: Prolonged use of computer equipment or games on this TV may cause permanent damage to your plasma screen. To avoid such damage, reduce the brightness and contrast to an acceptable level and limit the duration of use of computer equipment.

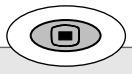
...notes on signal source entry

Each piece of external equipment connected to your TV must have its own input socket. It would also be easier, and more organized, if the external equipment connected also had its own programme number. *Signal Source entry allows you to tell the allocated program what equipment is connected to which socket.* This would make the switching between normal operation and the connected equipment much smoother.

For example, if you want to connect a games machine to your TV -

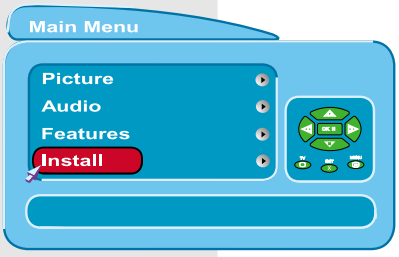
1. connect to socket AV2 via a scart lead.
2. give your games machine an empty programme number of its own.
3. if desired change this programme name.
4. give this programme the correct AV signal source.

1. Press the MENU button. The MAIN MENU appears.



2. Press the cursor DOWN button to select INSTALL.

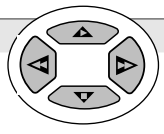
3. Once highlighted, accept selection.

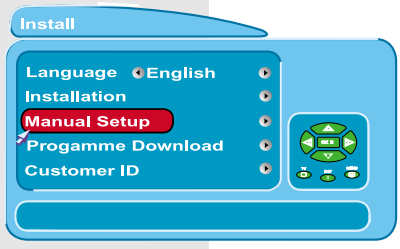


4. Press the cursor DOWN button to select MANUAL SETUP.

5. Once highlighted, accept selection.

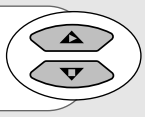
6. Use the UP/DOWN cursor keys to select the programme you wish to use and the LEFT/RIGHT cursor keys to move the selection bar over the AV required to be adjusted.

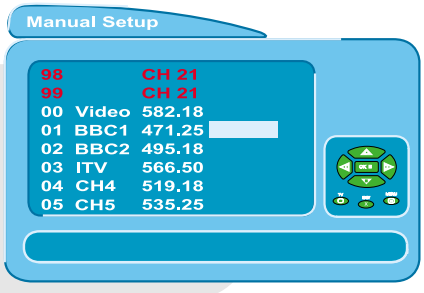




7. Once highlighted, accept selection.

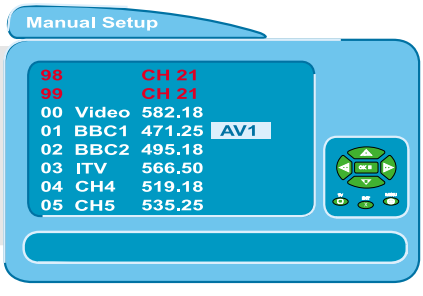
8. Select your method of signal source entry using the UP/DOWN cursor buttons.





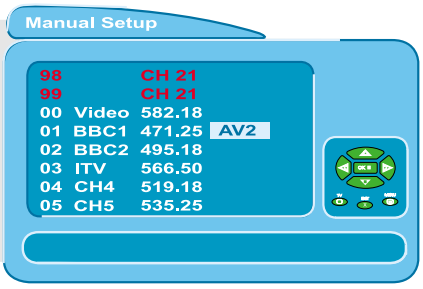
option 1

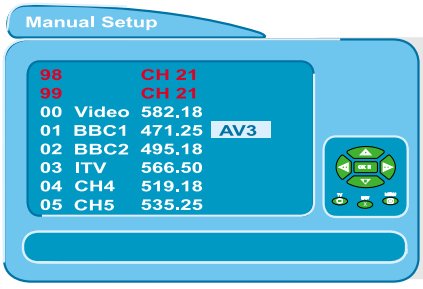
AV1 is the signal source used when connecting a VCR through a scart lead to the AV1 socket at the rear of your TV. For convenience, programme 0 is best used for your VCR.



option 2

AV2 is the signal source used when connecting external equipment such as home entertainment systems and Set Top Boxes/Decoders through a scart lead to the AV2 socket at the rear of your TV.



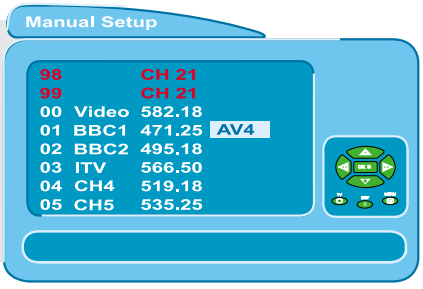


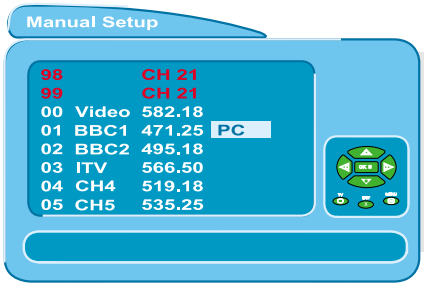
option 3

AV3 is the signal source used when connecting temporary equipment like a camcorder through the audio/video sockets at the front of your TV.

option 4

AV4 is the signal source used when connecting digital video broadcasting equipment or home entertainment systems through a scart lead to the AV4 socket at the rear of your TV.



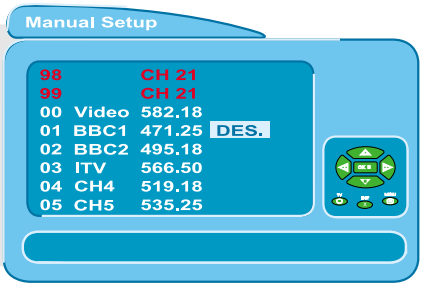


option 5

PC is the signal source used when connecting to a Personal Computer.
Please see the '**PC Mode**' section for details.

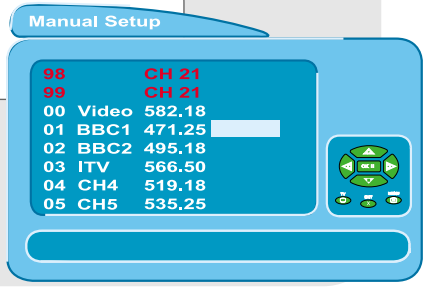
option 6

DES is the signal source used when connecting an external decoder, to descramble signals from the aerial (i.e. Canal +), through a scart lead to the AV1 socket at the rear of your TV.



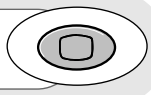
...notes on RF signal source

RF is the signal source used for standard television broadcasting and this should be used as the setting for normal TV programmes. This source appears blank.



9 Once the signal source for each relevant programme number has been decided, this can be stored in your TV's memory by pressing the OK button.

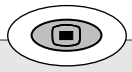
10 To return to normal TV operation press the TV button on your handset.



Language

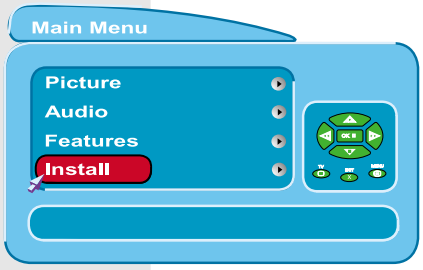
This enables you to change the language of the On Screen Displays. Please see below for details.

1. Press the MENU button. The MAIN MENU appears.



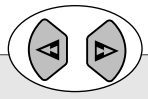
2. Press the cursor DOWN button to select INSTALL.

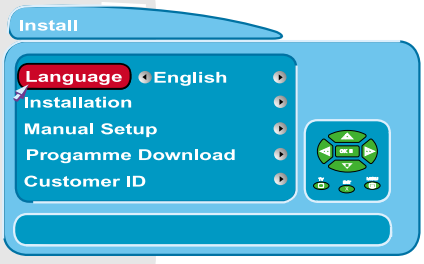
3. Once highlighted, accept selection.



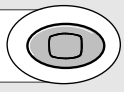
4. Press the cursor DOWN button to select LANGUAGE.

5. Adjust to your chosen language using the LEFT/RIGHT cursor buttons.





6. To return to normal TV operation press the TV button on your handset.



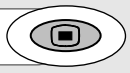
Installation

This enables you to repeat the Autotune installation if required, e.g. if you move house etc.

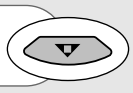
important note on Installation

Do not switch your TV on until all external equipment is connected. If you have a Video Cassette Recorder or a Satellite receiver connected to this TV please ensure that they are switched on before automatic tuning begins. In the case of a VCR, if it is not Viewlink compatible, insert a pre-recorded tape and begin playback of your equipment. If it is Viewlink compatible leave VCR in Standby. (See **viewlink** section of this manual for details). With a Satellite receiver select Sky News. These measures ensure that all your external equipment is tuned in during the autotune procedure.

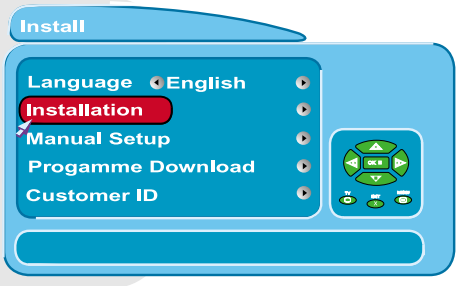
1. REPEAT STEPS 1 - 3 ABOVE.



4. Press the cursor DOWN button to select INSTALLATION.



5. Once highlighted, accept selection.

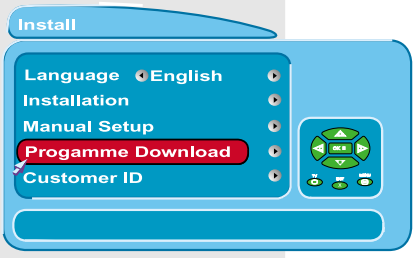


Please now turn to 'automatic tuning procedure', found in the 'tuning in' section of this manual, and follow the instructions, starting from STEP 4 and continuing through to STEP 7.

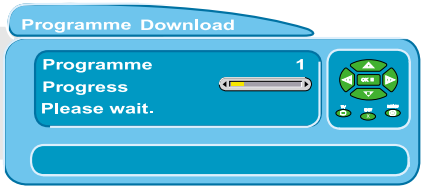
Programme Download

If you have purchased a Viewlink compatible VCR, select this feature to download the programme listings from your TV to the new VCR.

1. REPEAT STEPS 1 - 3 AS PREVIOUS.
4. Press the cursor DOWN button to select PROGRAMME DOWNLOAD.
5. Once highlighted, accept selection.



6. Your TV will now download the programme information.

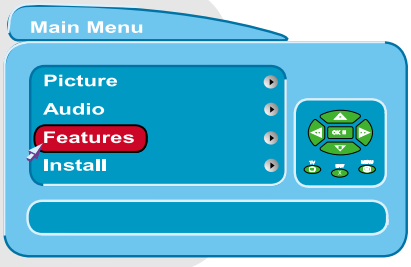


7. To return to normal TV operation press the TV button on your handset.

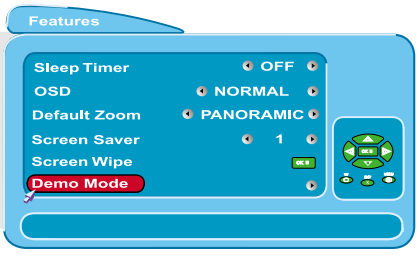
Demo Mode

This enables you to have a brief overview of the features available on your television.

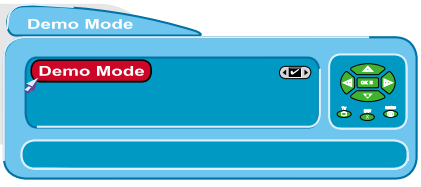
1. Press the MENU button to obtain MAIN MENU.
2. Press the cursor DOWN button to select FEATURES.
3. Once highlighted, accept selection.



4. Press the cursor DOWN button to select DEMO MODE.
5. Once highlighted, accept selection.



6. Use LEFT/RIGHT buttons to adjust the DEMO MODE options, i.e. ON/OFF.



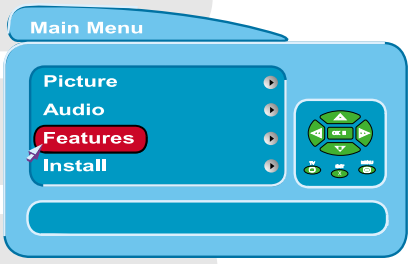
7. The TV will now demonstrate the features and On Screen Displays available on your TV.
PLEASE NOTE: This is a demonstration only - no settings are changed during this demonstration!

8. To return to normal TV operation, press the TV button on your handset.

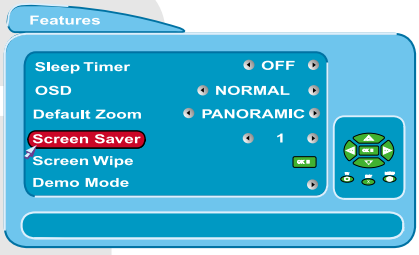
Screen Saver

This feature moves the picture around the screen in small amounts, at set intervals, to reduce persistence. This is where stationary objects, such as screen logos, leave a slight image visible after they should have disappeared.

1. Press the MENU button to obtain MAIN MENU.
2. Press the cursor DOWN button to select FEATURES.
3. Once highlighted, accept selection.



4. Press the cursor DOWN button to select SCREEN SAVER.
5. Once highlighted, use LEFT/RIGHT buttons to adjust the options i.e. 1, 2, or 3 :-
   OPTION 1 = 20 minutes
   OPTION 2 = 40 minutes
   OPTION 3 = 60 minutes

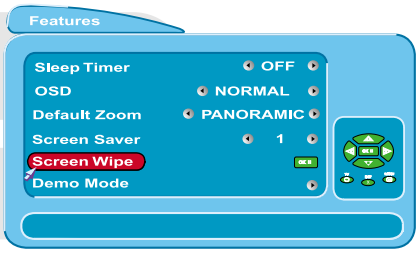


6. To return to normal TV operation, press the TV button on your handset.

Screen Wipe

This feature is used to remove any persistence that can occur with stationary pictures. To operate this facility please see below.

1. Enter the FEATURES menu as above. Press the cursor DOWN button to select SCREEN WIPE.
2. Once highlighted, press OK to activate SCREEN WIPE.



3. ***The screen will now turn white. Leave the set like this for approx. 10 minutes.***
4. To return to normal TV operation, press the TV button on your handset.

No Signal Shutdown

If your TV signal is lost for more than approx. 20 seconds, your screen will automatically switch into 'Power Saving' mode. The LED's on the front of the plasma screen and the AVC unit will both turn yellow. The picture will reappear immediately a signal is received.

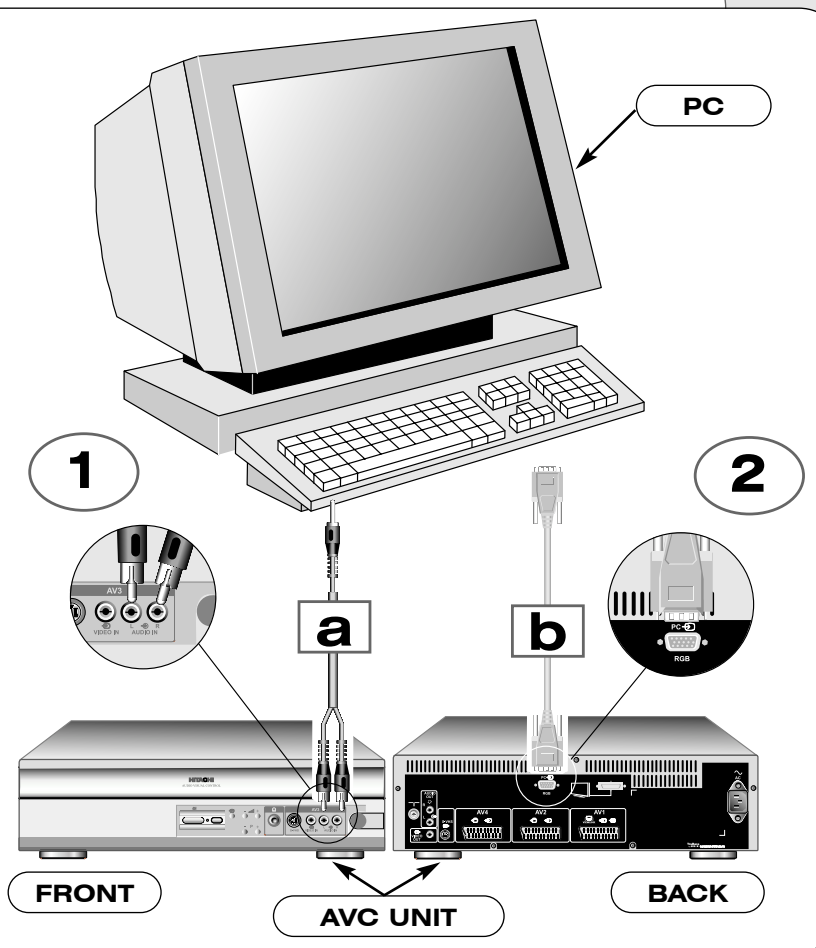
PC Mode

This enables you to connect your home computer, or laptop computer, to your TV to use the plasma screen as a display.

important note on Installation

Switch off your Plasma screen and AVC Unit before connecting or disconnecting any external equipment. Do not switch them on until all external equipment is connected correctly.

PC Setup



a → **PC AUDIO LEAD**

b → **RGB LEAD***

* It is recommended that you use an interface cable (TP-RGBVG) to connect between the AVC unit and your PC. (Not supplied).

1 Connect the **PC AUDIO LEAD** between the **PC** and **AVC Unit**.

2 Connect the **RGB LEAD** between the **PC** and **AVC Unit**.

Once all equipment has been connected correctly and switched on, press the AV button on your handset until 'PC' is displayed on the screen. Once you have entered PC Mode, whatever is being displayed on your PC monitor, (or laptop screen), will be displayed on your plasma screen. You can now setup the screen to suit your viewing preferences.

selecting the view mode

You can now select your preferred view mode. There are 3 modes of display to choose - PC FULL, PC NORMAL and PC REAL.

1 Press the 16:9 button on your handset once. 'PC FULL' will be displayed on the screen. Press the 16:9 button again and PC NORMAL will be displayed, and press again and PC REAL will be displayed. Please see opposite for details on each of these modes.

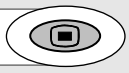
16:9

PC FULL	This mode fits the image to the full screen size.
PC NORMAL	This mode fits the image to a 4:3 screen size.
PC REAL	This mode gives the image the same shape as it is displayed on a computer monitor.* *Please Note: This format is only available for True VGA e.g. 640 x 480 - OK , 800 x 600 - not available.

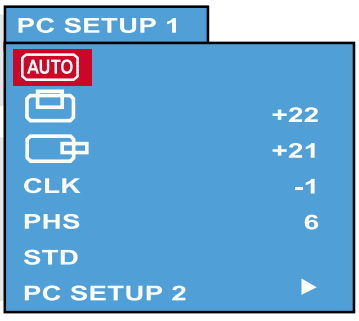
setting menu options

Use these menus to set the contrast, brightness, vertical and horizontal shift etc. Please follow the steps below.

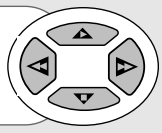
1. Press the MENU button. The PC SETUP 1 menu appears.



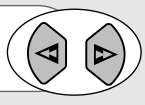
2. We recommend that you use the AUTO option. Highlight AUTO and press the OK button on your handset. You should not, under normal circumstances, need to adjust the other controls, but if you do, please see the following.

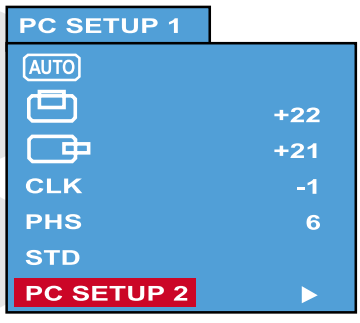


3. Press the UP/DOWN cursor buttons to select each option and the LEFT/RIGHT cursor buttons to change. Please see below for details on each of these options.

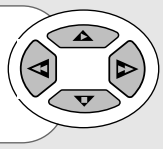


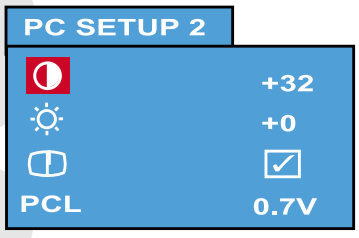
4. Once you have altered the options, highlight PC SETUP 2 and press the LEFT/RIGHT cursor buttons.



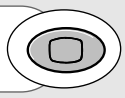


5. You will now enter the PC SETUP 2 menu. Press the UP/DOWN cursor buttons to select each option and the LEFT/RIGHT cursor buttons to change. Please see below for details on each of these options.





6. Once you have altered the options, press the TV button to return to normal PC Mode.



SETUP OPTIONS

Vertical Shift	Moves the picture up or down.	**Horizontal Shift**	Moves the picture left or right.
CLK	Use this control to remove any vertical interference.	**PHS**	Use this control to remove any horizontal interference.
STD	Use this control to return the current setting to shipping condition.	**Picture Enhancement**	This control makes the picture clearer.
Contrast & Brightness	Same as for TV operation Please Note : The settings you choose for PC mode will remain when you return to normal TV operation.	**PCL**	This determines the input level to the AVC unit from your computer. This is normally set to 0.7V but if the picture appears saturated, (too bright), select 1.0V

Recommended signal

This AVC unit has the following input signals already stored.

No.	SIGNAL			HORIZONTAL FREQUENCY (KHz)	DOTCLOCK FREQUENCY (MHz)	NOTES
	SIGNAL	RESOLUTION	VERT. FREQ. (Hz)			
1	VGA	640 X 400	70.10	31.48	25.18	
2		640 X 480	59.94	31.47	25.18	
3	VESA	640 X 480	72.81	37.86	31.50	
4		800 X 600	75.00	37.50	31.50	
5		800 X 600	56.25	35.16	36.00	
6		800 X 600	60.32	37.88	40.00	
7		800 X 600	72.19	48.08	50.00	
8		800 X 600	75.00	46.88	49.50	
9		1280 X 768	60.00	48.36	65.00	
10		1280 X 768	70.07	56.48	75.00	
11		1280 X 768	75.05	60.02	78.75	
12		1280 X 1024	60.02	63.98	108.00	
13		1280 X 1024	75.03	79.98	135.00	

Input signal timings

It is recommended to use the following input signal timings

	HORIZONTAL FREQUENCY	FRONT PORCH	SYNC. PULSE WIDTH	BACK PORCH	BLANKING WIDTH
HORIZONTAL TIMING	24 - 52KHz	>0.1us	1.0 - 3.8us	>1.2us	>3.5us
	52 - 107KHz	>0.1us	0.8 - 3.0us	>1.1us	>2.3us
VERT. TIMING		>9us	>25us	>400us	>450us

questions	answers
Why won't my TV switch on?	Check that the plasma screen and the AVC unit are connected together correctly. Check that both plugs are connected to the socket and switched on, check fuse and make sure TV is not in standby mode (see below).
Why doesn't my remote control handset work?	Make sure there are no obstructions between the handset and the TV's infra-red lens, or the batteries may be exhausted - replace the whole set of batteries.

problem identification	possible reason	remedy
snowy picture - poor sound	Connection of aerial lead to the TV is poor.	Make new connection and/or change aerial plug.
	Corroded or poor aerial connections.	Make new connections or renew lead.
	Aerial has moved position.	Re-align aerial.
	Adverse weather conditions.	None.
	Transmitter problems.	Check with local Operator.
multiple images - sound O.K	Aerial has moved position.	Re-align aerial.
	TV not tuned correctly.	Re-tune or fine tune TV.
	Adverse weather conditions.	None.
	Transmitter problems.	Check with local Operator.
	AV Input not set correctly.	Check what external equipment is connected and check its scart AV status.
intermittent interference	Interference from electrical or mechanical motors, fluorescent lights, portable radios etc.	Check devices for shielding and renew if necessary or move further from TV.
no picture or sound	TV may be in AV mode.	Press the AV button ⇒ or 0 to 9 buttons on your handset to return to normal TV mode.
	Picture/sound controls set to minimum.	Check picture/sound controls (go to MAIN MENU).
	TV in standby or power save mode.	Press one of the buttons 0 to 9.

If a problem still continues after referring to this guide contact your dealer immediately.
Under NO circumstances remove the rear cover of your plasma screen or the casing of your Audio Visual Control (AVC) unit.

Guarantee

Thank You for purchasing this Hitachi Television.

In the unlikely event that this product should develop a fault, we undertake to repair or replace any part of the product which fails due to a manufacturing defect within 12 months of the date of purchase provided that...

1. the product has been installed and used only in accordance with the instructions supplied with the product.
2. the product has not been repaired, maintained, or modified by any person other than a Hitachi authorized dealer.
3. the product serial number has not been removed or altered.

- this guarantee does not apply to a product acquired second hand or for commercial or communal use.
- this guarantee does not cover the replacement of exhausted batteries, the adjustment of user controls, or aerial alignment.
- any parts replaced under this guarantee shall become the property of Hitachi Home Electronics (Europe) Ltd.
- please note that evidence of the date of purchase will be required before any service under this guarantee is carried out.

Use the boxes provided below to record your TV's Model and Serial Number - these are found on the rating plate located on the rear of the TV. Also, record where and when you purchased this T.V. This information will help any future queries you may have and should be used in all correspondence with Hitachi service centres.

MODEL	SERIAL NUMBER	DEALER/STORE	DATE PURCHASED

This guarantee does not affect your statutory rights.

In all cases of difficulty please consult your Hitachi dealer.

Environmental Notice

Hitachi are signatories to the commitment made by the consumer electronics industry on reducing energy consumption by televisions and video recorders on standby.

Even though your TV has a low power consumption, you can reduce waste to zero if you switch off the set at the mains after use. Your TV should certainly be switched off overnight or when you are away from home. Other factors should also be considered when operating your TV. Reducing volume settings to sensible levels can reduce power consumption as well as reducing noise pollution, and reducing contrast can provide a more pleasing picture as well as reducing power consumption.

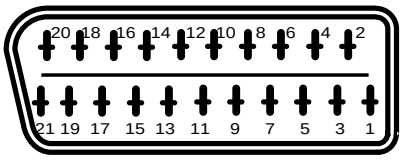
Hitachi Home Electronics (Europe) Ltd. manufacturing site in Wales is a BSI Registered Company, and has been assessed to ISO 9001 Quality Management Standard, certificate FM32366. Your television has been manufactured under the Environmental Quality Management Standard ISO14001, certificate EMS 36168.

The paper used for this Users Guide has been produced from sustainable forests, part of Hitachi's on going commitment to the global environment.

television specification

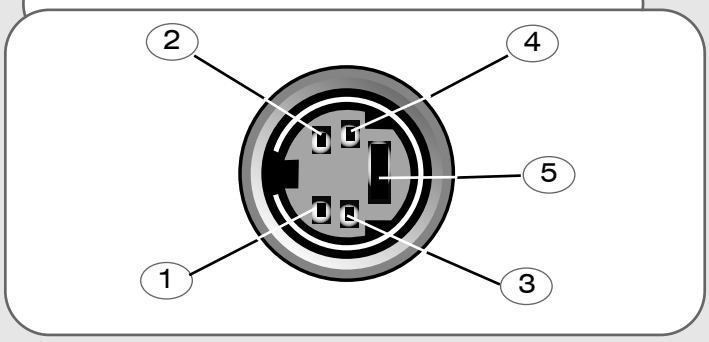
TV Standard	50Hz
Aerial Impedance	75 Ωunbalanced
Screen Size	32", 37", 42" type
Mains Voltage	220 - 240V AC 50 Hz
Sound Output	6 Ω10Watt
Power Consumption Plasma Screen	32" = 260W (approx)
	37" = 315W (approx)
	42" = 360W (approx)
Power Consumption AVC Unit	All models = 30W (approx)
	Standby <6W (all models)
Weight - Plasma Screen	32" = 26.0kg (NET)
	37" = 30.0kg (NET)
	42" = 34.0kg (NET)
Weight - AVC Unit	All models = 9.0kg (NET)
Dimensions Plasma Screen (Width x Depth x Height)	32" = 974 x 90 x 500 (mm)
	37" = 1145 x 115 x 575 (mm)
	42" = 1235 x 115 x 635 (mm)
Dimensions AVC Unit (Width x Depth x Height)	All models = 430 x 293 x 121 (mm)
System	Cable/Hyperband/PAL/SECAM
	PAL60/NTSC4,43/3.58/I/B.G.H/LL
Remote Control Batteries	2 x HITACHI R6P(G)
	(Equivalent 'AA')

scart sockets



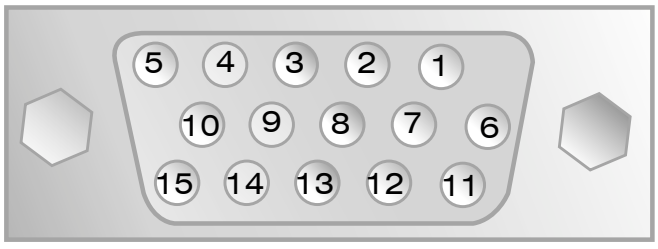
	scart socket AV1	scart socket AV2	scart socket AV4
1		AUDIO OUT (RIGHT)	NOT USED
2	AUDIO OUT (RIGHT)	AUDIO INPUT (RIGHT)	AUDIO INPUT (RIGHT)
3	AUDIO INPUT (RIGHT)	AUDIO OUT (LEFT)	NOT USED
4	AUDIO OUT (LEFT)	GROUND (AUDIO)	GROUND (AUDIO)
5	GROUND (AUDIO)	GROUND (BLUE)	GROUND (BLUE)
6	NOT USED	AUDIO INPUT (LEFT)	AUDIO INPUT (LEFT)
7	AUDIO INPUT (LEFT)	BLUE INPUT	BLUE INPUT
8	NOT USED	SWITCHING INPUT	SWITCHING INPUT
9	SWITCHING INPUT	GROUND (GREEN)	GROUND (GREEN)
10	NOT USED	NOT USED	NOT USED
11	DATALINK TO VCR (VIEWLINK)	GREEN INPUT	GREEN INPUT
12	NOT USED	NOT USED	NOT USED
13	NOT USED	GROUND (RED)	GROUND (RED)
14	CHROMINANCE GROUND	GROUND (BLANKING)	GROUND (BLANKING)
15	NOT USED	RED INPUT	RED INPUT
16	S–VHS CHROMINANCE INPUT	STATUS (BLANKING) INPUT	STATUS (BLANKING) INPUT
17	NOT USED	GROUND (VIDEO)	GROUND (VIDEO)
18	GROUND (VIDEO)	GROUND (VIDEO)	GROUND (VIDEO)
19	GROUND (VIDEO)	COMPOSITE VIDEO OUTPUT	NOT USED
20	COMPOSITE VIDEO OUTPUT	COMPOSITE VIDEO INPUT	COMPOSITE VIDEO INPUT
21	COMPOSITE VIDEO OR S–VHS LUMINANCE INPUT GROUND	GROUND	GROUND

S-VHS socket



PIN	FUNCTION
1	CHROMINANCE INPUT
2	LUMINANCE INPUT
3	CHROMINANCE GROUND
4	LUMINANCE GROUND
5	FRAME GROUND

mini D-sub 15 pin connector



PIN	INPUT SIGNAL
1	R VIDEO
2	G VIDEO
3	B VIDEO
4	NONE
5	NONE
6	R GND
7	G GND
8	B GND
9	NONE
10	GND
11	NONE
12	NONE
13	H SYNC
14	V SYNC
15	NONE

HITACHI

Hitachi, Ltd. Tokyo, Japan
International Sales Division
THE HITACHI ATAGO BUILDING,
No. 15 –12 Nishi Shinbashi, 2 – Chome,
Minato – Ku, Tokyo 105-8430, Japan.
Tel: 03 35022111

HITACHI EUROPE LTD,
Whitebrook Park
Lower Cookham Road
Maidenhead
Berkshire
SL6 8YA
UNITED KINGDOM
Tel: 01628 643000
Fax: 01628 643400
Email: **consumer-service@hitachi-eu.com**

HITACHI EUROPE S.A.
364 Kifissias Ave. & 1, Delfon Str.
152 33 Chalandri
Athens
GREECE
Tel: 1-6837200
Fax: 1-6835964
Email: **service.hellas@hitachi-eu.com**

HITACHI EUROPE GmbH
Munich Office
Dornacher Strasse 3
D-85622 Feldkirchen bei München
GERMANY
Tel: +49-89-991 80-0
Fax: +49-89-991 80-224
Hotline: +49-180-551 25 51 (12ct/min)
Email: **HSE-DUS.service@hitachi-eu.com**

HITACHI EUROPE S.A.
Gran Via Carlos III, 101-1
08028 Barcelona
SPAIN
Tel: 93 409 2550
Fax: 93 491 3513
Email: **atencion.cliente@hitachi-eu.com**

HITACHI EUROPE srl
Via Tommaso Gulli N.39, 20147
Milano, Italia
ITALY
Tel: +39 02 487861
Tel: +39 02 38073415 Servizio Clienti
Fax: +39 02 48786381/2
Email: customerservice.italy@hitachi-eu.com

HITACHI Europe AB
Box 77 S-164 94 Kista
SWEDEN
Tel: +46 (0) 8 562 711 00
Fax: +46 (0) 8 562 711 13
Email: **csgswe@hitachi-eu.com**

HITACHI EUROPE S.A.S
Lyon Office
B.P. 45, 69671 BRON CEDEX
FRANCE
Tel: 04 72 14 29 70
Fax: 04 72 14 29 99
Email: **france.consommateur@hitachi-eu.com**

HITACHI EUROPE LTD (Norway) AB
STRANDVEIEN 18
1366 Lysaker
NORWAY
Tel: 67 5190 30
Fax: 67 5190 32
Email: **csgnor@hitachi-eu.com**

HITACH EUROPE AB
Egebækgård
Egebækvej 98
DK-2850 Nærum
DENMARK
Tel: +45 43 43 6050
Fax: +45 43 60 51
Email: **csgnor@hitachi-eu.com**

HITACHI EUROPE AB
Neopoli / Niemenkatu 73
FIN-15140 Lahti
FINLAND
Tel : +358 3 8858 271
Fax: +358 3 8858 272
Email: **csgnor@hitachi-eu.com**

Hitachi Europe Ltd
Bergensesteenweg 421
1600 Sint-Pieters-Leeuw
BELGIUM
Tel: +32 2 363 99 01
Fax: +32 2 363 99 00
Email: **sofie.van.bom@hitachi-eu.com**

HITACHI EUROPE LTD
Na Sychrove 975/8
101 27 Praha 10 – Bohdalec
CZECH REPUBLIC
Tel: +420 267 212 383
Fax: +420 267 212 385
Email: **csgnor@hitachi-eu.com**

www.hitachidigitalmedia.com